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December 20, 2005

4563.01

Humboldt County Department of Health and Human Services
Division of Environmental Health
100 H Street, Suite 100
Eureka, California 95501

Attention: Mr. Mark Verhey, C.E.G.

Subject: Groundwater Monitoring Report; Fourth Quarter 2005
Former Fortuna Shell; 809 Main Street, Fortuna, California
LOP No. 12672

Dear Mr. Verhey:

LACO ASSOCIATES (LACO) presents the results of groundwater monitoring for the fourth quarter of 2005, for the presently operating Gas-4-Less. The site, former Fortuna Shell, is located in Fortuna, California (Figures 1 and 2). This report has been prepared on behalf of W & S Enviro.

The following elements are included within this report:

- Summary of work performed;
- Site chronology;
- Bulleted summary of hydraulic gradients;
- Tabular summary of analytical data;
- Statement of future work; and
- Figures representing shallow and perched zone equipotentials.

Please call (707) 443-5054 if you have any questions or concerns.

Sincerely,
LACO ASSOCIATES

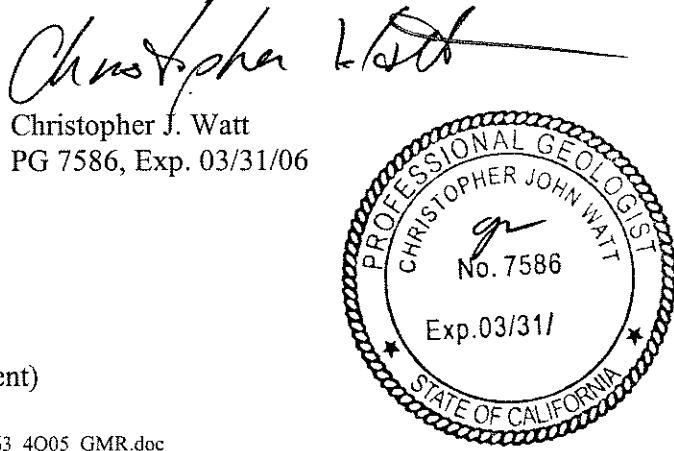
Brian Hodgson
Junior Engineer

BRH:jg

Attachments

cc: Jim Seiler, W & S Enviro (electronically sent)

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GROUNDWATER MONITORING REPORT; FOURTH QUARTER 2005

Former Fortuna Shell; 809 Main Street, Fortuna, California

LOP No. 12672; LACO Project No. 4563.01

INTRODUCTION

This report presents the cumulative results of groundwater monitoring conducted at the former Fortuna Shell (hereafter referred to as the ‘site’) since 2000. Field activities were conducted on November 1, 2005, in accordance with generally accepted practices at this or similar locations. Monitoring well sampling protocol is included in LACO’s *Standard Operating Procedures*, on file at your office. Details of the current groundwater monitoring sampling event are presented below in Table A. A location map and site map are included as Figures 1 and 2, respectively. Field sampling forms are included as Attachment 1.

SITE CHRONOLOGY

1998: Temporary borings B1 through B11 were installed in conjunction with an underground storage tanks (USTs) closure investigation.

1999: Four USTs were removed from the site.

- Tank 1: 2,000-gallon
- Tank 2: 10,000-gallon
- Tank 3: 10,000-gallon
- Tank 4: 8,000-gallon

Approximately 140 cubic yards of impacted cavity fill material and soil was excavated during tank removal activities and transported by Roger’s Trucking to TPS Technologies in Richmond, California, for treatment and disposal.

2000: A domestic well survey was conducted and included properties located within 600 feet of the site. Monitoring wells MW1 through MW5 were installed within the perched zone and monitoring wells MW6 through MW8 were installed within the shallow zone. Temporary borings B1-00 through B20-00 were installed to investigate the stratigraphy of the site and define lateral and vertical extents of secondary source petroleum hydrocarbons. Soil and depth discrete groundwater samples were collected; where possible, groundwater samples were collected from both the perched zone and the next underlying water bearing unit.

- 2001:** Groundwater samples were collected for analysis of microbial activity from monitoring wells MW4, MW5, and MW7 in the perched zone unit, and monitoring well MW8 in the shallow zone. LACO personnel performed bail and slug tests on monitoring wells MW1 and MW2 to determine hydraulic conductivities in the perched zone. Monitoring wells MW9 through MW13 were installed off-site in the shallow zone. Temporary borings HP1 through HP6 were installed to collect discrete groundwater samples from the shallow zone off-site and the intermediate zone on-site.
- 2002:** Four temporary borings from were installed adjacent to monitoring wells MW9, MW10, MW11, and MW12 to further characterize soils at the site (no soil or groundwater samples were obtained for laboratory analyses). A Corrective Action Plan that proposed remedial action using enhanced bio-remediation of the secondary source petroleum hydrocarbons and monitored natural attenuation of the dissolved-phase plume was submitted to the Humboldt County Division of Environmental Health (HCDEH).
- 2003:** A Remediation Action Plan (RAP) was submitted to the HCDEH detailing the proposed scope of work to install, operate, and monitor an oxygen sparge system to reduce on-site secondary source petroleum hydrocarbon mass.
- 2004:** Monitoring wells MW14, MW15, and MW16 were installed to serve as monitoring points for the forthcoming remediation program. Temporary borings B12 and B13 were installed in the alley west of the site. The presence of dissolved-phase methyl tertiary butyl ether (MTBE) in one boring led to the installation of two additional monitoring wells, MW17S and MW17D (S = shallow, D = deep), which are being used to delineate the dissolved-phase MTBE plume.

Two sparge wells, one within the shallow zone and one within the perched zone, were installed at the site for an oxygen sparging pilot test. In order to establish baseline data, groundwater samples were collected from monitoring wells MW4, MW6, and MW7 prior to start-up of the oxygen system.

- 2005:** A RAP Addendum that utilized data from the oxygen sparging pilot test to design an effective remedial methodology was submitted to the HCDEH. The remedial methodology included an oxygen sparging system to reduce on-site secondary source petroleum hydrocarbon mass and monitoring the natural attenuation of the off-site fuel oxygenate plume.

Table A: Sampling Regime for November 1, 2005.

Monitoring Well ID	Screened Interval (feet)	DTW (feet)	Purge Method	Water Quality Parameters	Organic Analyticals	Lead Scavengers	Sampling Schedule
MW1	6-10	7.24		pH, T, ECw, ORP, DO			
MW2	5-10	7.07	DHP		TPHg, TPHd, TPHmo, BTEX, MTBE, DIPE, ETBE, TAME, TBA		
MW3	5-12	7.31					
MW4	5-10	7.45					
MW5	5-10	7.77	¾" Bailer	---			
MW6	12-20	7.99					
MW7	10-15	7.12					
MW8	15-20	8.65					
MW9	12-15	10.21					
MW10	12.5-15.5	9.84	DHP	pH, T, ECw, ORP, DO	TPHg, BTEX, MTBE, DIPE, ETBE, TAME, TBA		
MW11	12.5-15.6	11.70					
MW12	12.5-15	11.03					
MW13	12.5-16	9.94					
MW14	5-10	7.47			TPHg, TPHd, TPHmo, BTEX, MTBE, DIPE, ETBE, TAME, TBA		
MW15	5-10	7.65					
MW16	5-11	7.03					
MW17S	22.5-24.5	22.20	¾" Bailer	---	TPHg, BTEX, MTBE, DIPE, ETBE, TAME, TBA		
MW17D	26-28	26.26					

A key to abbreviations is included as Attachment 2

HYDROGEOLOGY AND HYDRAULIC GRADIENT

Stratigraphic data from boring and monitoring well installations to date indicate that several primarily sand and gravel water-bearing units exist, and are primarily separated by layers of dense clayey silt to depths of approximately 40 feet below ground surface (bgs). Previous investigations have indicated that the upper contact of the dense, well-graded gravel of the Rohnerville formation occurs from 38 to 45 feet bgs. The Rohnerville formation functions as a confined artesian water-bearing unit in the vicinity of the subject property.

Equipotential maps for the perched and shallow zones were generated using the November 1, 2005, hydraulic head elevations, and are presented as Figures 3 and 4, respectively. The hydraulic gradient in the perched zone was calculated using the three-point method in the area defined by monitoring wells MW1, MW3, and MW14. The hydraulic gradient in the shallow zone was calculated using the three-point method in the area defined by monitoring wells MW7, MW11, and MW13. These monitoring wells were selected because they are located along the site perimeter and best represent hydraulic gradients of the site.

Hydraulic gradient, perched zone (Figure 3)

- N60°W direction at 0.02 feet per foot

Hydraulic gradient, shallow zone (Figure 4)

- S67°W direction at 0.04 feet per foot

Calculated gradients for shallow and perched zones are consistent with previous monitoring events (Table 1). Current and historic hydraulic head elevations are presented in Table 2.

LABORATORY ANALYTICAL RESULTS AND DISCUSSION

Groundwater analytical data from the current sampling event is included below in Table B. Copies of the current laboratory results and case narratives from the laboratory are included as Attachment 3. Historic and current groundwater analytical results are presented in Table 2.

Table B: Analytical Results, November 1, 2005.

WELL ID	TPHg (µg/L)	TPHd (µg/L)	TPHmo (µg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylbenzene (µg/L)	Total Xylenes (µg/L)	MTBE (µg/L)	TBA (µg/L)	TAME (µg/L)	ETBE (µg/L)	DIPE (µg/L)	Other Analytes (µg/L)
MW1	460	ND<50	ND<170	0.65	ND<0.50	1.8	ND<0.50	ND<1.0	ND<10	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW2	6,100	500	ND<170	28	4.4	24	18	ND<7.0	ND<10	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW3	280	69	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	76	ND<22	4.7	ND<1.0	ND<1.0	All ND<1.0-3.0
MW4	2,300	240	ND<170	9.5	1.2	9.1	5.0	ND<8.0	41	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW5	13,000	12,000	7,100	630	15	97	80	ND<400	61	6.2	ND<1.0	ND<1.0	All ND<1.0-3.0
MW6	ND<50	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	11	ND<10	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW7	230	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	280	ND<65	12	1.3	ND<1.0	All ND<1.0-3.0
MW8	1,200	110	ND<170	1.3	ND<0.50	ND<0.50	ND<0.50	3,000	420	80	9.8	2.1	All ND<1.0-3.0
MW9	ND<50	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	5.8	ND<10	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW10	99	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	4.1	ND<10	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW11	ND<50	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	2.2	ND<10	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW12	340	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	580	ND<10	21	1.8	1.1	All ND<1.0-3.0
MW13	250	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	390	ND<10	14	ND<1.0	ND<1.0	All ND<1.0-3.0
MW14	920	92	ND<190	0.88	ND<0.50	1.3	ND<0.50	6.6	ND<10	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW15	2,500	99	ND<210	180	4.4	35	12	ND<120	ND<28	2.6	ND<1.0	ND<1.0	All ND<1.0-3.0
MW16	6,100	860	1,800	1,000	16	27	36	430	280	11	4.5	ND<1.0	All ND<1.0-3.0
MW17S	ND<50	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	4.1	ND<10	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW17D	92	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	64	ND<35	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0

A key to abbreviations is included as Attachment 2

Laboratory results reported for samples collected during the November 1, 2005, quarterly sampling event are consistent within the range of results historically reported for active wells.

FUTURE WORK

The next quarterly monitoring event is scheduled for February 2006. A proposal for

implementation of the remedial design was submitted to the Underground Storage Tank Cleanup Fund (Fund) in June 2005. Pre-remediation baseline sampling will be performed following Fund approval of the Pay-for-Performance program.

LIMITATIONS

LACO has exercised a standard of care equal to that generated for this industry to ensure that the information contained in this report is current and accurate. LACO disclaims any and all liability for any errors, omissions, or inaccuracies in information and data presented in this report and/or any consequences arising there from, whether attributable to inadvertence or otherwise. LACO makes no representations or warranties of any kind, including but not limited to any implied warranties with respect to the accuracy or interpretations of the data furnished. LACO assumes no responsibility of any third party reliance on the data presented and that data generated for this report represents information gathered at that time and at the indicated locations. It should not be utilized by any third party to represent data for any other time or location. This report is valid solely for the purpose, site, and project described within this document. Any alteration, unauthorized distribution, or deviation from this description will invalidate this report.

LIST OF FIGURES, TABLES, AND ATTACHMENTS

Figure 1: Location Map

Figure 2: Site Map

Figure 3: Hydrologic Gradient Map, Perched Wells (11/1/05)

Figure 4: Hydrologic Gradient Map, Shallow Wells (11/1/05)

Table 1: Historic Hydraulic Gradients

Table 2: Well Data and Groundwater Analytical Results

Attachment 1: Field Sampling Forms

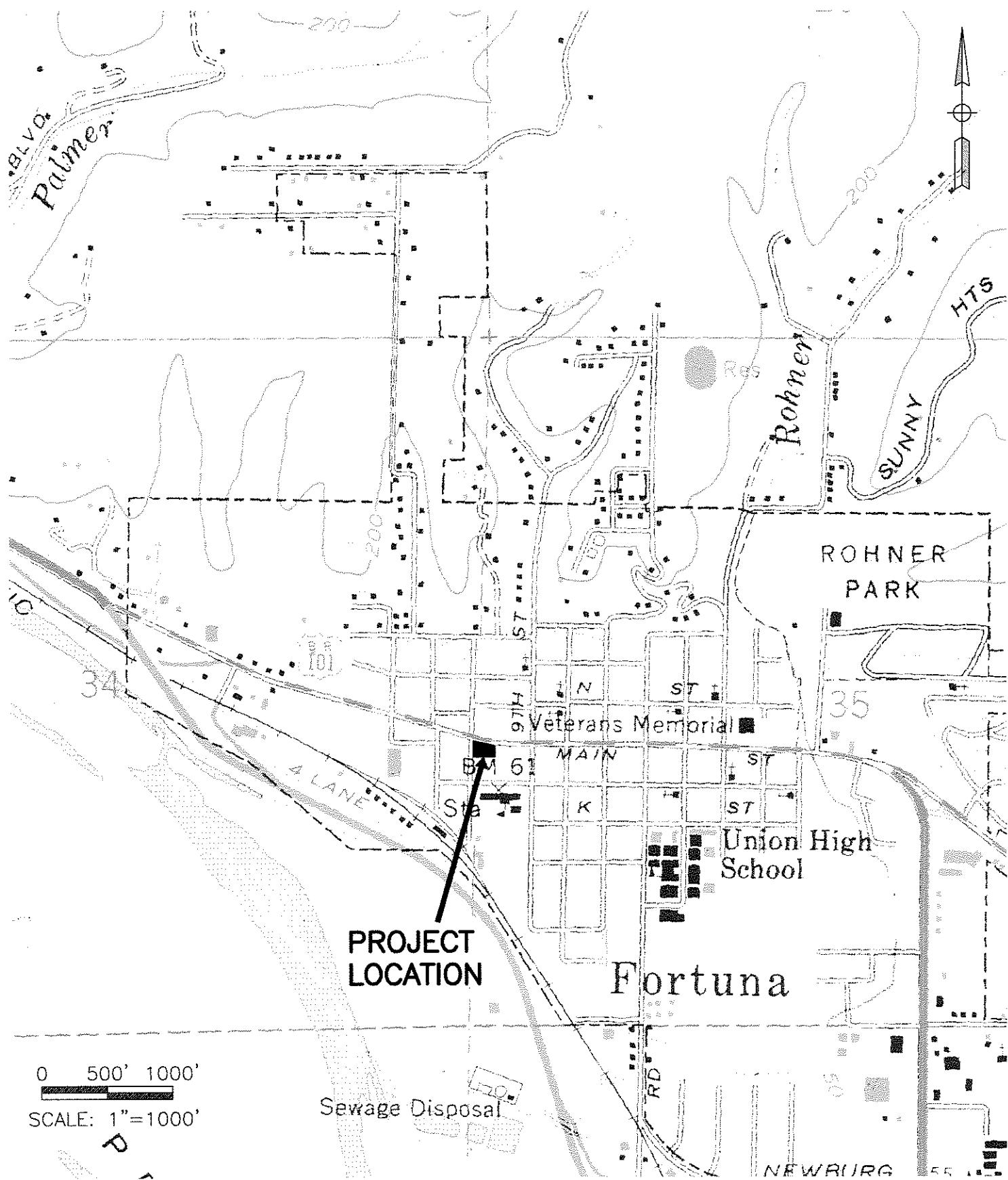
Attachment 2: Key to Abbreviations

Attachment 3: Current Laboratory Analytical Results

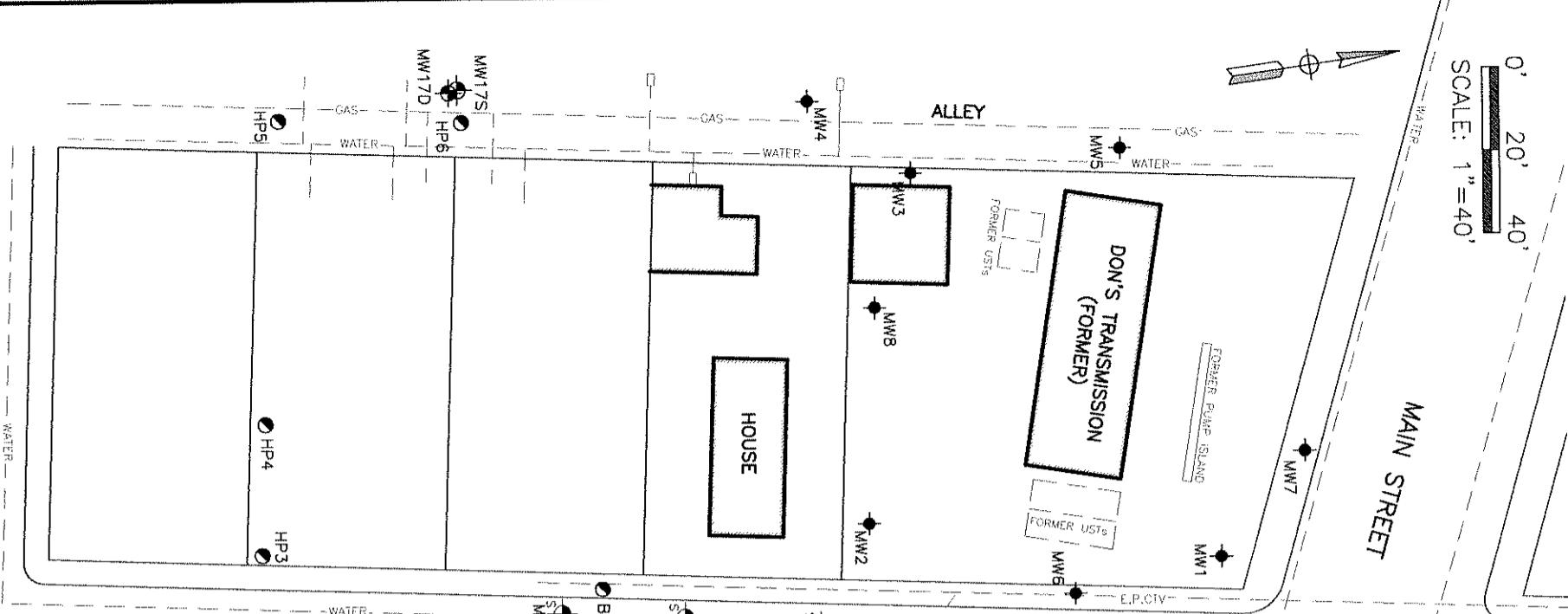


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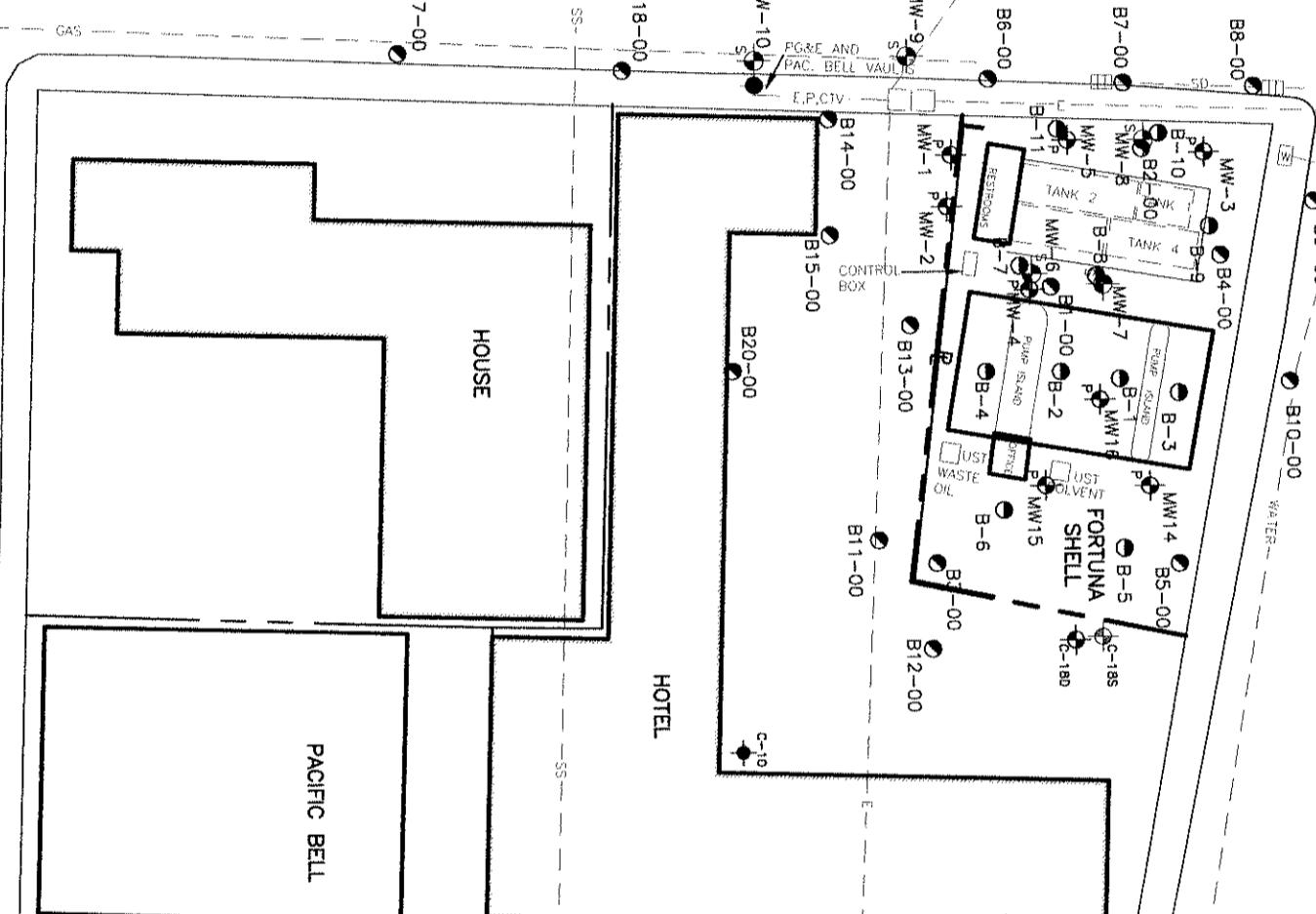
PROJECT	GROUNDWATER MONITORING REPORT	BY	BAB	FIGURE
CLIENT	W & S ENVIRO	DATE	12/05/05	1
LOCATION	FORTUNA SHELL	CHECK	BK	JOB NO.
LOCATION MAP		SCALE	1"=1000'	4563.01



0' 20' 40'
SCALE: 1" = 40'



EIGHTH STREET



LEGEND

- MONITORING WELL
- PERCHED MONITORING WELL
- SHALLOW MONITORING WELL
- BORING
- HYDROPUNCH BORING
- C-12S SHALLOW MONITORING WELL-CHEVRON
- C-12R INTERMEDIATE MONITORING WELL-CHEVRON
- C-12D DEEP MONITORING WELL-CHEVRON
- DESTROYED MONITORING WELL

UTILITY

- DRAINAGE INLET
- WATER METER
- SD = STORM DRAIN
- E = ELECTRIC
- P = TELEPHONE
- CTV = CABLE TELEVISION

(MH) = MANHOLE

GROUNDWATER MONITORING REPORT

SITE MAP

W & S ENVRO

FORTUNA SHELL

809 MAIN STREET, FORTUNA

SCALE: 1" = 40'

DRAWN BY DATE

APPROVED

DATE

JOB NO.

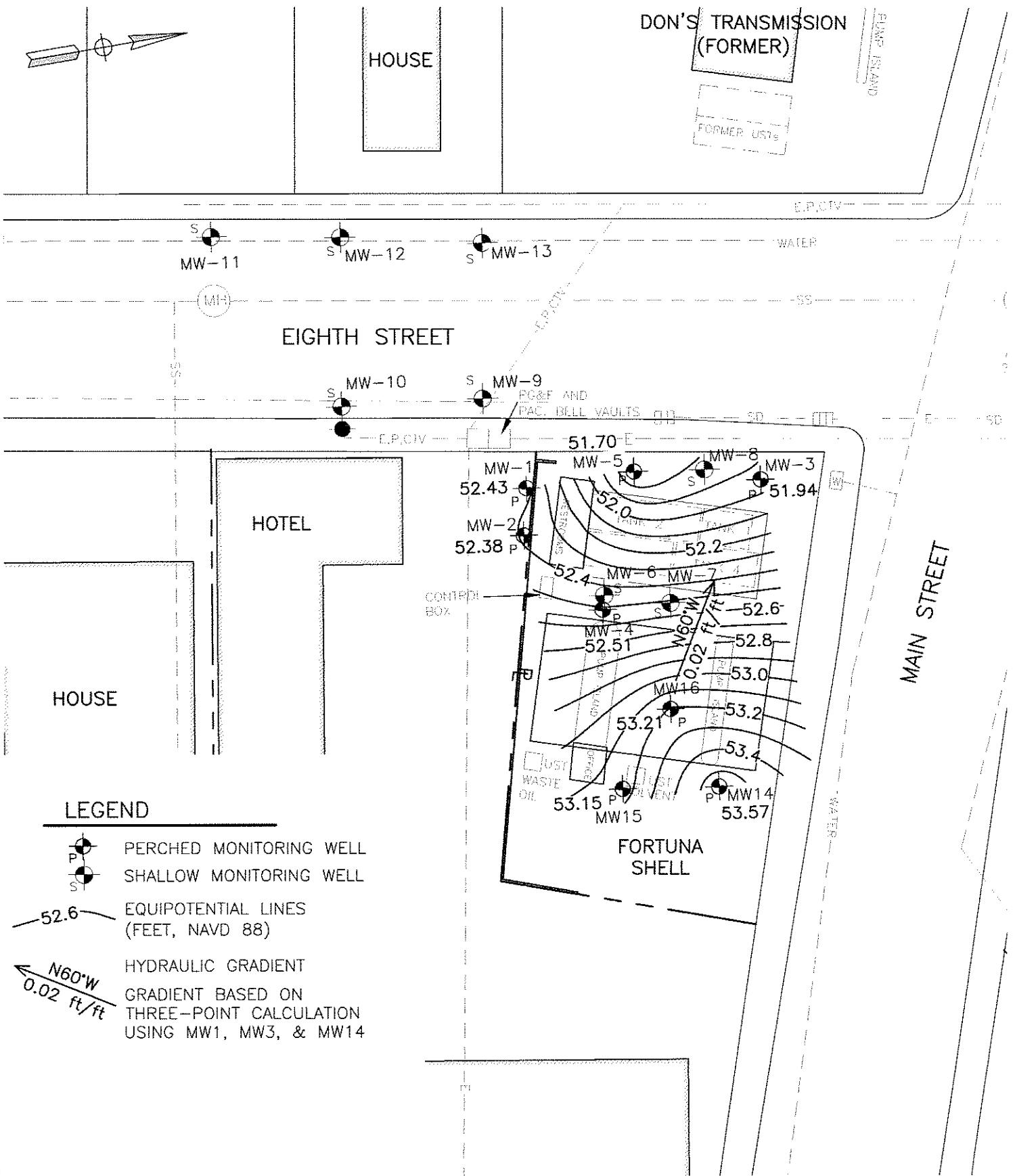
FIGURE

2



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PROJECT	GROUNDWATER MONITORING REPORT	BY	BAB	FIGURE
CLIENT	W & S ENVIRO	DATE	12/07/05	4
LOCATION	FORTUNA SHELL, 809 MAIN ST.	CHECK	<i>BB</i>	JOB NO.
	HYDRAULIC GRADIENT, SHALLOW WELLS (11/1/05)	SCALE	1"=30'	4563.01

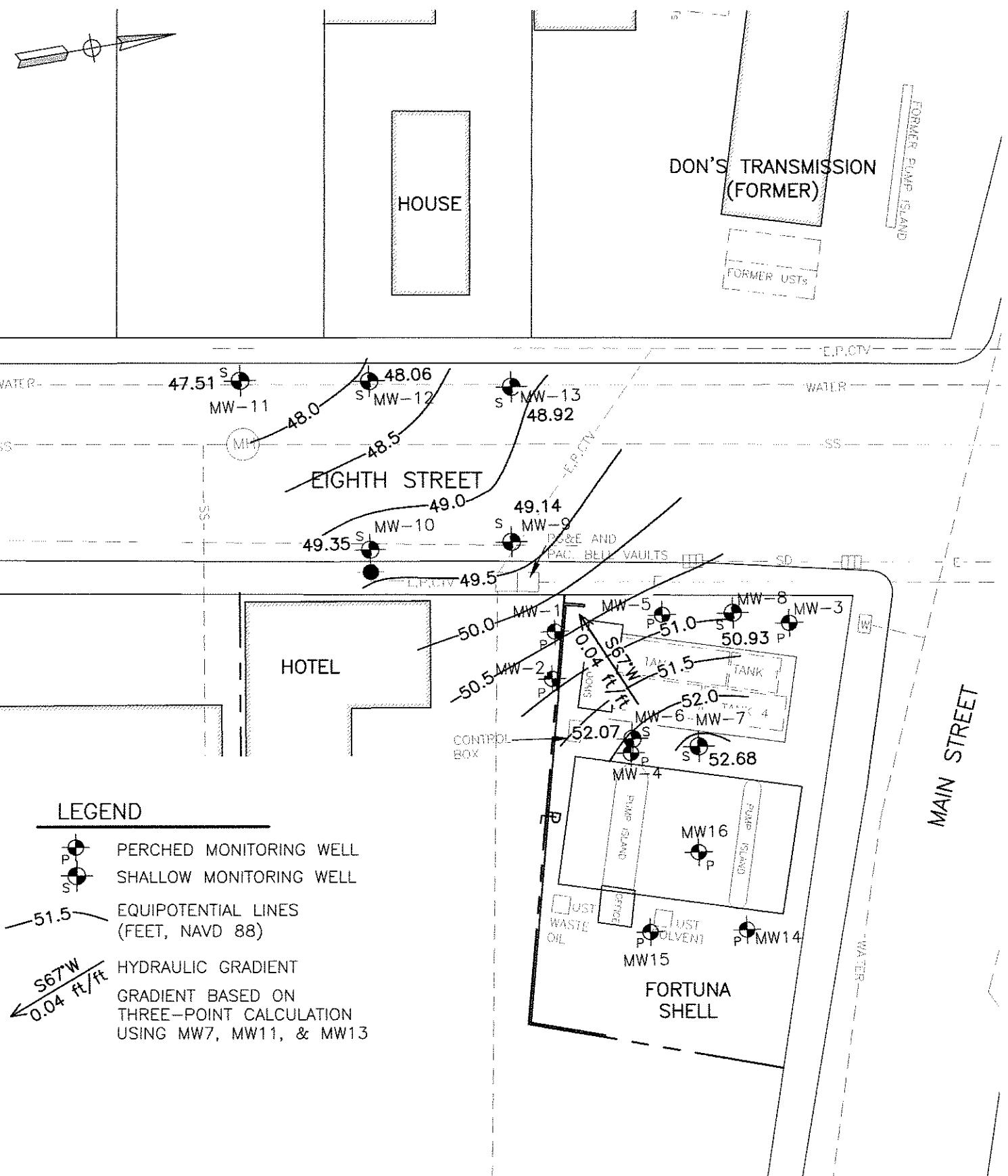


TABLE 1: HISTORIC HYDRAULIC GRADIENTS

Fortuna Shell; 809 Main St., Fortuna, California

LOP No. 12672; LACO No. 4563.01

Date	Shallow Aquifer		Perched Aquifer	
	Gradient Direction	Slope (ft/ft)	Gradient Direction	Slope (ft/ft)
9/2000	S2°E	<0.01	S48°W	0.01
10/2000	S2°E	<0.01	S45°E	0.01
11/2000	S22°E	<0.01	S34°W	0.02
12/12/2000	S56°W	0.06	---	---
1/8/2000	S64°W	0.11	---	---
3/12/2001	S37°W	0.14	---	---
6/2001	S43°W	0.14	S31°W	0.03
7/2001	S43°W	0.13	S34°W	0.02
8/2001	S71°E	0.24	S27°W	0.01
9/2001	S54°W	0.16	S29°W	0.01
10/2001	S54°W	0.16	S37°W	0.01
11/2001	S54°W	0.15	S32°W	<0.01
2/5/2002	N35°W	0.07	N19°E	0.02
5/9/2002	S49°W	0.14	S62°W	0.02
8/15/2002	S30°W	0.06	S24°W	0.12
12/20/2002	S56°W	0.07	S22°W	0.02
2/11/2003	S47°W	0.07	N8°E	0.02
5/13/2003	---	---	N19°E	0.02
8/14/2003	S13°W	0.04	S1°W	0.02
11/4/2003	S24°W	0.22	S3°E	0.02
2/2/2004	S37°W	0.02	N13°E	0.03
5/4/2004	S26°W	0.03	N62°W	0.02
8/3/2004	N65°W	0.02	N79°W	0.02
11/10/2004	N88°W	0.04	N81°W	<0.01
2/1/2005	S86°W	0.04	N47°W	0.02
5/3/2005	S79°W	0.05	N35°W	0.03
8/2/2005	S74°W	0.04	N66°W	0.02
11/1/2005	S67°W	0.04	N60°W	0.02

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS
Fortuna Shell, 809 Main St., Fortuna, California
LCP No. 12672; LACO No. 4563.01

WELL Sample Date	Well Head Elevation (feet NAVD 88)	Groundwater Measurements	Depth to Water (feet)	Analytical Results								Other Analytes (µg/L)
				TPHg (µg/L)	TPHd (µg/L)	TPhm (µg/L)	Benzene (µg/L)	Toluene (µg/L)	MtBE (µg/L)	TBA (µg/L)	TAME (µg/L)	
MWL	8/4/2000	59.67	Screened Interval = 6-10 feet bgs	53.51	6.16	---	---	27	20.1	500	ND>20	56
	8/7/2000	53.41	6.26	3,600	230	ND<170	42	5	ND<1.0	ND<1.0	ND<1.0	---
	9/8/2000	52.64	7.03	--	--	--	--	--	--	--	--	---
	10/12/2000	52.15	7.52	--	--	--	--	--	--	--	--	---
11/3/2000	53.91	5.76	2,900	210	ND<170	9.2	1.4	8.1	5.5	250	120	27
12/12/2000	54.60	5.07	--	--	--	--	--	--	--	--	--	---
1/8/2001	54.83	4.84	--	--	--	--	--	--	--	--	--	---
2/6/2001	54.83	4.84	2,800	570	ND<170	23	2.4	12	4.8	74	ND>20	ND>2.0
3/12/2001	55.47	4.20	--	--	--	--	--	--	--	--	--	---
4/20/2001	54.87	4.80	--	--	--	--	--	--	--	--	--	---
5/8/2001	54.69	4.98	3,400	420	ND>200	37	3.9	19	7.52	120	ND<10	ND<1.0
6/8/2001	54.42	5.25	--	--	--	--	--	--	--	--	--	---
7/16/2001	53.69	5.98	--	--	--	--	--	--	--	--	--	---
8/7/2001	53.21	6.46	2,300	190	ND<170	25	3.6	18	9.42	130	ND>5.0	ND<1.0
9/17/2001	52.69	6.98	--	--	--	--	--	--	--	--	--	---
10/24/2001	52.15	7.52	--	--	--	--	--	--	--	--	--	---
11/6/2001	52.13	7.54	4,300	350	ND<170	25	2.2	15	7.5	94	53	9.2
2/5/2002	55.60	4.07	2,100	99	--	16	3.9	24	8.5	20	25	2.6
5/9/2002	54.85	4.82	2,300	130	ND<170	18	2.6	16	3.6	8.7	ND>5.0	1.0
8/15/2002	53.11	6.56	1,500	130	ND<170	6.6	1.2	7.3	8.4	9.9	ND<5.0	ND<1.0
12/20/2002	56.52	3.15	410	ND<30	ND<170	ND<50	ND<50	ND<50	0.50	ND<1.0	ND>20	ND<1.0
2/11/2003	55.42	4.25	1,700	140	ND<170	13	4.6	17	4.8	15	ND>20	1.1
5/31/2003	54.79	4.88	320	ND<50	ND<170	3.1	1.5	5.9	2.4	1.8	ND>20	ND<1.0
8/14/2003	52.47	7.20	1,700	320	ND<170	7.0	1.3	7.7	3.5	13	ND>20	1.4
11/4/2003	51.72	7.95	4,500	320	ND<170	31	3.8	17	12	ND>70	ND<1.0	2.8
2/2/2004	56.71	2.96	80	ND<50	ND<170	ND<50	ND<50	ND<50	ND<50	ND<1.0	ND<1.0	ND<1.0
5/4/2004	54.27	5.40	130	ND<50	ND<170	ND<50	ND<50	ND<50	ND<50	ND<1.0	ND<1.0	ND<1.0
8/3/2004	52.12	7.55	1,400	180	ND<170	4.7	0.87	3.7	1.5	ND>6.0	ND<10	ND<1.0
11/10/2004	54.27	5.40	61	ND<50	ND<170	ND<50	ND<50	ND<50	ND<50	ND<1.0	ND<1.0	ND<1.0
2/1/2005	55.07	4.60	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	ND<50	ND<1.0	ND<1.0	ND<1.0
5/3/2005	54.62	5.05	3,900	370	ND<170	4.4	3.7	18	6.78	ND<1.0	ND<1.0	ND<1.0
8/2/2005	53.29	6.38	2,400	290	ND<170	3.6	1.5	12	3.61	ND<1.0	ND<20	ND<1.0
11/1/2005	52.43	7.24	460	ND<50	ND<170	0.65	ND<50	1.8	ND<0.50	ND<1.0	ND<1.0	ND<1.0
MW2	8/4/2000	59.45	Screened Interval = 5-10 feet bgs	53.49	5.96	--	--	--	--	--	--	---
	8/7/2000	53.45	6.00	8,000	330	ND<170	160	8.6	34	49	790	ND>50
	9/8/2000	52.62	6.83	--	--	--	--	--	--	--	--	ND<2.5
	10/12/2000	52.12	7.33	--	--	--	--	--	--	--	--	---
11/3/2000	53.98	5.47	8,600	510	ND<170	130	6.2	25	32	680	420	86
12/12/2000	54.59	4.86	--	--	--	--	--	--	--	--	--	---
1/8/2001	54.37	4.58	--	--	--	--	--	--	--	--	--	---
2/6/2001	54.38	4.77	8,200	590	ND<170	150	9.6	39	40	310	ND>50	ND<5.0
3/12/2001	55.04	4.41	--	--	--	--	--	--	--	--	--	---
4/20/2001	54.91	4.54	--	--	--	--	--	--	--	--	--	---
5/8/2001	54.65	4.80	8,000	950	ND<200	110	6.9	30	32	280	ND>25	ND<2.5
6/8/2001	54.42	5.03	--	--	--	--	--	--	--	--	--	---
7/16/2001	53.75	5.70	--	--	--	--	--	--	--	--	--	---
8/7/2001	53.23	6.22	5,900	300	ND<170	47	4.5	17	19	180	ND>25	ND<2.5
9/17/2001	52.74	6.71	--	--	--	--	--	--	--	--	--	---
10/24/2001	52.25	7.20	--	--	--	--	--	--	--	--	--	---
											All ND<1.0	All ND<1.0

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS
Fortuna Shell; 899 Main St., Fortuna, California
LOP No. 12672; LACO No. 4563.01

WELL Sample Date	Groundwater Measurements			Depth to Water (feet)	TPHg (µg/L)	TPHd (µg/L)	Benzene (µg/L)	Toluene (µg/L)	Xylenes (µg/L)	MTBE (µg/L)	TBA (µg/L)	TAME (µg/L)	ETBE (µg/L)	DIPE (µg/L)	DIPN (µg/L)	Other Analytes (µg/L)
	Well Head Elevation (feet NAVD 88)	Hydraulic Head Elevation (feet NAVD 88)	Water (feet)													
MW2 Contained																
1/6/2001	52.17	7.28	8,400	580	ND<170	100	8.7	33	160	ND<50	1.5	ND<5.0	ND<5.0	ND<5.0	ND<3.0	ND<3.0
2/5/2002	—	—	9,900	460	—	160	13	51	170	ND<30	21	ND<3.0	ND<3.0	ND<3.0	ND<3.0	ND<3.0
5/9/2002	54.81	4.64	7,800	360	ND<170	100	8.6	44	37	54	ND<40	6.1	ND<4	ND<4	ND<4	ND<4
8/15/2002	50.84	8.61	6,400	720	ND<170	110	11	42	44	65	ND<200	5.6	ND<4	ND<4	ND<4	ND<4
12/20/2002	56.25	3.20	5,200	330	ND<170	20	ND<5.0	18	16	ND<20	ND<10	ND<10	ND<10	ND<10	ND<10	ND<10
2/11/2003	54.93	4.52	7,900	610	ND<170	100	10	50	49.3	ND<300	92	10	ND<1.0	ND<1.0	ND<1.0	ND<1.0
5/13/2003	55.39	4.06	6,200	600	ND<170	51	7.7	41	37.8	ND<100	ND<20	5.2	ND<1.0	ND<1.0	ND<1.0	ND<1.0
8/14/2003	52.40	7.05	9,400	810	ND<170	70	7.3	34	29.7	ND<180	31	7.6	ND<1.0	ND<1.0	ND<1.0	ND<1.0
1/14/2003	Well was inaccessible			—	—	—	—	—	—	—	—	—	—	—	—	—
2/2/2004	56.17	3.28	5,900	730	ND<170	21	5.4	27	20.3	ND<14	ND<10	1.1	ND<1.0	ND<1.0	ND<1.0	ND<1.0
5/4/2004	54.20	5.25	7,000	500	ND<170	60	11	51	40	ND<45	ND<20	2.4	ND<1.0	ND<1.0	ND<1.0	ND<1.0
8/3/2004	52.13	7.32	7,300	740	ND<170	47	7.9	39	31.3	ND<36	ND<10	1.8	ND<1.0	ND<1.0	ND<1.0	ND<1.0
11/10/2004	54.14	5.31	6,300	980	ND<170	32	6.3	34	27.2	ND<15	ND<10	1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0
2/1/2005	55.03	4.42	7,600	220	ND<170	34	6.3	41	35.6	ND<10	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0
5/3/2005	54.70	4.75	11,000	990	ND<170	30	5.7	33	26.3	ND<10	ND<15	1.1	ND<1.0	ND<1.0	ND<1.0	ND<1.0
8/2/2005	53.34	6.11	4,500	820	ND<170	23	5.4	26	20	ND<7	ND<10	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0
11/1/2005	52.38	7.07	6,100	500	ND<170	28	4.4	24	18	ND<7.0	ND<10	ND<1.0	ND<1.0	ND<1.0	ND<1.0	All ND<1.0-3.0
MW3																
8/4/2000	59.25	Screened Interval = 5-12 feet bgs			6.19	—	ND<170	4.3	ND<4.0	ND<4.0	ND<4.0	5,600	2,500	550	—	—
8/7/2000	53.11	6.14	2,300	74	—	—	—	—	—	—	—	—	—	—	—	—
9/8/2000	52.58	6.67	—	—	—	—	—	—	—	—	—	—	—	—	—	—
10/12/2000	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
11/3/2000	53.46	5.79	2,000	59	ND<170	ND<2.0	ND<2.0	—	—	—	—	—	—	—	—	—
12/12/2000	53.85	5.40	—	—	—	—	—	—	—	—	—	—	—	—	—	—
1/8/2001	53.94	5.31	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2/6/2001	54.32	4.93	1,900	ND<50	ND<170	7.6	ND<5.0	ND<5.0	ND<5.0	ND<100	2,000	—	—	—	—	—
3/12/2001	53.70	5.55	—	—	—	—	—	—	—	—	—	—	—	—	—	—
4/20/2001	54.23	5.02	—	—	—	—	—	—	—	—	—	—	—	—	—	—
5/8/2001	53.92	5.33	1,200	56	ND<200	1.4	ND<1.3	ND<1.3	ND<1.3	1,100	270	130	ND<2.5	ND<2.5	ND<10	ND<10
6/8/2001	53.68	5.57	—	—	—	—	—	—	—	—	—	—	—	—	—	—
7/16/2001	53.16	6.09	—	—	—	—	—	—	—	—	—	—	—	—	—	—
8/7/2001	52.95	6.30	740	ND<50	ND<170	5.1	ND<1.3	ND<1.3	ND<1.3	970	200	94	ND<2.5	ND<2.5	ND<1.0	ND<1.0
9/7/2001	52.75	6.50	—	—	—	—	—	—	—	—	—	—	—	—	—	—
10/24/2001	52.22	7.03	—	—	—	—	—	—	—	—	—	—	—	—	—	—
11/6/2001	51.92	7.33	880	ND<50	ND<170	1.5	ND<1.0	ND<1.0	ND<1.0	1,100	160	99	ND<2.0	ND<2.0	2.2	ND<1.0
2/5/2002	54.58	4.67	6,00	ND<50	—	0.74	ND<0.50	ND<0.50	ND<0.50	740	310	86	—	—	—	—
5/9/2002	54.23	5.02	920	ND<50	ND<170	5.3	ND<0.50	0.81	0.81	470	100	40	ND<1.0	ND<1.0	1.1	ND<1.0
8/15/2002	52.96	6.29	590	71	ND<170	6.3	0.56	0.95	0.95	420	150	30	—	—	4	ND<1.0
12/20/2002	54.97	4.28	99	ND<50	ND<170	0.90	ND<0.50	0.59	0.59	91	ND<70	57	ND<1.0	ND<1.0	ND<1.0	ND<1.0
2/11/2003	54.54	4.71	740	ND<50	ND<170	2.8	1.1	ND<0.50	5.06	720	300	—	—	—	—	—
5/13/2003	54.96	4.29	1,300	220	ND<170	4.3	1.2	22.9	680	300	60	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0
8/14/2003	52.36	6.89	820	95	ND<170	3.4	0.7	ND<0.50	3.9	1,000	180	73	ND<1.0	ND<1.0	1.2	ND<1.0
11/4/2003	51.79	7.46	650	ND<50	ND<170	26	1.4	0.81	1.54	940	78	65	ND<1.0	ND<1.0	1.5	ND<1.0
2/2/2004	55.27	3.98	3,600	490	ND<170	4.6	1.0	ND<0.50	6.4	180	79	53	ND<1.0	ND<1.0	5.3	ND<1.0
5/4/2004	53.84	5.41	2,200	310	ND<170	4.6	1.0	ND<0.50	2.58	81	ND<40	—	—	—	—	—

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS
Fortuna Shell; 899 Main St., Fortuna, California
LQP No. 12672; LACO No. 4563.01

WELL Sample Date	Groundwater Measurements			Depth to Water (feet)	TPHg (µg/L)	TPHmo (µg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylenbenzene (µg/L)	Total Xylenes (µg/L)	MTBE (µg/L)	TBA (µg/L)	TAME (µg/L)	ETBE (µg/L)	DPE (µg/L)	Other Analytes (µg/L)
	Well Head Elevation (feet NAVD 88)	Hydraulic Head Elevation (feet NAVD 88)	Water (feet NAVD 88)													
MW3 Continued																
8/3/2004	52.06	7.19	9.60	140	ND<170	0.68	ND<0.50	ND<0.50	ND<0.50	1.32	220	42	14	ND<1.0	ND<1.0	
11/10/2004	53.31	5.94	9.10	190	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND>50	290	ND>50	19	ND<1.0	ND<1.0	
2/1/2005	54.46	4.79	2.990	460	ND<170	8.4	0.89	0.56	3.5	44	ND>30	31	ND<1.0	ND<1.0		
5/3/2005	53.58	5.67	1.600	280	ND<170	1.1	ND<0.50	ND<0.50	ND<0.50	1.29	23	ND>20	2.0	ND<1.0	ND<1.0	
8/2/2005	53.03	6.22	830	160	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND>50	45	ND>20	3.2	ND<1.0	ND<1.0	
11/1/2005	51.94	7.31	280	69	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND>50	76	ND>22	4.7	ND<1.0	ND<1.0	
MW4																
8/4/2000	53.73	6.23	---	---	ND<170	900	32	69	159	620	---	---	45	ND<1.0	ND<1.0	
8/7/2000	53.67	6.29	11,000	530	---	---	---	---	---	---	---	---	---	---	---	---
9/8/2000	52.85	7.11	---	---	---	---	---	---	---	---	---	---	---	---	---	---
10/12/2000	52.33	7.63	---	---	---	600	20	80	82.5	180	ND<100	ND<5.0	ND>5.0	---	---	
11/3/2000	53.87	6.09	6,400	61	ND<170	600	---	---	---	---	---	---	---	---	---	---
12/12/2000	54.67	5.29	---	---	---	---	---	---	---	---	---	---	---	---	---	---
1/8/2001	54.72	5.24	---	---	---	550	ND<170	540	12	47	140	ND<100	ND<10	ND<10	ND<10	
2/6/2001	55.21	4.75	5,400	---	---	---	---	---	---	---	---	---	---	---	---	---
3/12/2001	55.44	4.52	---	---	---	570	660	26	130	98.8	190	ND<100	ND<10	ND<10	ND<10	
4/20/2001	55.21	4.75	---	---	---	920	ND>200	620	24	120	76.2	210	ND>50	ND>5.0	ND<5.0	
5/8/2001	54.96	5.00	6,200	---	---	---	---	---	---	---	---	---	---	---	---	
6/8/2001	54.84	5.12	---	---	---	---	---	---	---	---	---	---	---	---	---	
7/16/2001	54.04	5.92	---	---	---	520	520	570	26	130	98.8	190	ND<100	ND<10	ND<10	
8/7/2001	53.43	6.53	5,900	---	---	---	---	---	---	---	---	---	---	---	---	
9/7/2001	52.96	7.00	---	---	---	---	---	---	---	---	---	---	---	---	---	
10/24/2001	52.39	7.57	---	---	---	---	---	---	---	---	---	---	---	---	---	
11/6/2001	52.36	7.60	7,200	200	ND<170	670	30	100	77	120	ND<100	ND<10	ND<10	ND<10	ND<10	
2/5/2002	55.56	4.40	4,800	83	---	340	14	48	27	100	32	5.8	ND>3.0	ND>3.0	ND>3.0	
5/9/2002	55.47	4.49	3,800	260	ND<170	300	19	74	48.6	52	ND>30	ND>3.0	ND>3.0	ND>3.0	ND>3.0	
8/15/2002	54.07	5.89	4,700	280	ND<170	350	21	82	46.7	81	ND>50	ND>5.0	ND>5.0	ND>5.0	ND>5.0	
12/20/2002	55.80	4.16	6,900	260	ND<170	430	32	97	52	ND<150	ND<1000	ND>50	ND>50	ND>50	ND>50	
2/11/2003	55.58	4.38	5,700	64	ND<170	430	24	57	55.9	500	230	28	1.1	ND<1.0	1,2-DCA=1.3	
5/13/2003	54.91	5.05	5,500	500	ND<170	360	27	85	65.7	ND<200	47	8.1	ND<1.0	ND<1.0	1,2-DCA=1.0	
8/14/2003	52.90	7.06	7,400	440	ND<170	480	22	79	47.4	120	51	5.6	1.1	ND<1.0	ND<1.0	
11/4/2003	52.01	7.95	10,000	700	ND<170	600	35	110	71.8	ND<150	ND<20	4.4	ND<1.0	ND<1.0	1,2-DCA=1.0	
2/2/2004	56.19	3.77	8,400	740	ND<170	450	27	85	63	ND<150	ND>60	4.6	ND<1.0	ND<1.0	ND<1.0	
5/4/2004	54.77	5.19	3,500	120	ND<170	74	8.5	26	27.1	ND<80	ND<50	2.0	ND<1.0	ND<1.0	ND<1.0	
8/3/2004	52.65	7.31	420	ND<50	ND<170	43	0.66	2.1	1.9	ND<1.0	ND<10	ND<1.0	ND<1.0	ND<1.0	ND<1.0	
11/10/2004	54.16	5.80	190	ND<50	ND<170	1.1	ND<0.50	0.95	0.99	ND>2.0	ND<10	ND<1.0	ND<1.0	ND<1.0	ND<1.0	
2/1/2005	55.48	4.48	170	ND<50	ND<170	0.71	ND<0.50	ND<0.50	ND<0.50	ND<4.0	ND<10	ND<1.0	ND<1.0	ND<1.0	ND<1.0	
5/3/2005	55.35	4.61	300	ND<50	ND<170	1.3	ND<0.50	ND<0.50	ND<0.50	ND<15	1.8	ND<10	ND<1.0	ND<1.0	ND<1.0	
8/2/2005	53.93	6.03	220	60	ND<170	2.6	ND<0.50	ND<0.50	ND<0.50	ND<50	1.7	ND<10	ND<1.0	ND<1.0	ND<1.0	
11/1/2005	52.51	7.45	2,300	240	ND<170	9.5	1.2	9.1	5.0	ND>8.0	41	ND<1.0	ND<1.0	ND<1.0	All ND<1.0	
MW5																
8/4/2000	59.47	Screened Interval = 5-10 feet bgs	53.10	6.37	---	---	---	---	---	---	---	---	---	---	---	---
8/7/2000	53.31	6.16	23,000	1,900	ND<170	3,600	61	590	1,556	4,500	ND<500	ND>25	ND>25	ND>25	ND>25	ND>25
9/8/2000	53.02	6.45	---	---	---	---	---	---	---	---	---	---	---	---	---	---
10/12/2000	52.47	7.00	---	---	---	---	---	---	---	---	---	---	---	---	---	---
11/3/2000	53.59	5.88	17,000	1,200	930	2,500	60	800	940	2,300	ND>500	ND>25	ND>25	ND>25	ND>25	ND>25

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS
Fortuna Shell; 819 Main St., Fortuna, California
LOP No. 12672; LACO No. 4563.01

WELL Sample Date	Groundwater Measurements			Analytical Results							Other Analytes (µg/L)		
	Well Head Elevation (feet NAVD 88)	Hydraulic Head Elevation (feet NAVD 88)	Depth to Water (feet)	TPHg (µg/L)	TPHd (µg/L)	TPhmo (µg/L)	Benzene (µg/L)	Toluene (µg/L)	Total Xylenes (µg/L)	MTBE (µg/L)	TBA (µg/L)	ETBE (µg/L)	DPE (µg/L)
MW5 Continued													
12/12/2000	54.28	5.19	--	--	--	--	--	--	--	--	--	--	--
1/8/2001	54.26	5.21	--	--	--	ND<170	2,600	49	370	320	2,300	ND<50	ND<50
2/6/2001	54.45	5.02	17,000	890	--	--	--	--	--	--	--	--	--
3/12/2001	54.33	4.64	--	--	--	ND>200	2,300	48	510	555	1,700	ND<25	ND<25
4/20/2001	54.76	4.71	--	--	--	ND>200	2,300	--	--	--	--	--	--
5/8/2001	54.56	4.91	14,000	1,300	--	--	--	--	--	--	--	--	--
6/8/2001	54.45	5.02	--	--	--	ND>200	2,300	--	--	--	--	--	--
7/16/2001	53.58	5.79	--	--	--	ND>200	2,300	--	--	--	--	--	--
8/7/2001	53.33	6.14	14,000	1,100	330	2,200	52	390	420	2,000	ND<250	ND<25	ND<25
9/17/2001	52.98	6.49	--	--	--	ND>200	2,300	--	--	--	--	--	--
10/24/2001	52.48	6.99	--	--	--	ND>200	2,300	--	--	--	--	--	--
11/6/2001	52.34	7.13	20,000	1,100	420	2,500	48	550	493	2,300	550	21	ND<20
2/5/2002	55.26	4.21	15,000	660	--	2,100	42	390	391	2,200	890	48	ND<20
5/9/2002	54.76	4.71	10,000	810	210	1,400	33	260	270	790	ND<200	21	ND<20
8/15/2002	53.88	5.79	13,000	1,300	960	1,200	33	210	280	910	ND<200	24	ND<20
12/20/2002	55.23	4.24	40,000	6,900	13,000	1,800	51	460	380	ND<1800	ND<50	ND<50	ND<50
2/11/2003	56.06	3.41	13,000	880	1,200	1,500	34	200	239.7	710	230	25	3.5 ND<1.0
5/13/2003	54.79	4.68	13,000	1,100	1,000	1,000	33	230	230	590	ND<1000	ND<50	ND<50
8/14/2003	53.89	6.38	18,000	1,500	610	1,700	44	340	240	760	ND<1000	ND<50	ND<50
11/4/2003	52.25	7.22	52,000	37,000	56,000	1,500	33	340	259.4	ND<1200	ND<200	17	ND<10
2/2/2004	56.17	3.30	19,000	2,200	300	1,300	29	240	208.1	680	99	16	ND<5.5 ND<1.0
5/4/2004	54.59	4.88	31,000	6,500	5,100	1,500	37	310	217.4	ND<1000	82	14	2.3 ND<10
8/3/2004	52.92	6.55	21,000	2,900	1,100	1,600	32	220	160	530	ND<500	ND<50	ND<50
11/10/2004	54.14	5.33	140,000	25,000	12,000	20	50	401	ND-850	59	8	2	ND<1.0
2/1/2005	54.86	4.61	23,000	6,000	3,200	910	24	130	134.1	400	34	8.1	1.4 ND<1.0
5/3/2005	55.28	4.19	21,000	3,900	640	18	180	112.5	210	75	6.9	1.2 ND<1.0	
8/2/2005	54.02	5.45	29,000	8,000	3,500	550	18	56	153.2	ND<300	53	4.3 ND<1.0	
11/1/2005	51.70	7.77	13,000	12,000	7,100	630	15	97	80	ND<400	61	6.2 ND<1.0	All ND<1.0
MW6													
8/4/2000	52.86	7.20	--	--	--	ND<170	2.6	ND<2.5	1.1	1.9	820	--	--
8/7/2000	52.14	7.92	1,200	140	--	ND<170	--	--	--	--	--	5.4	3.0
9/8/2000	51.64	8.42	--	--	--	ND<170	--	--	--	--	--	--	--
10/12/2000	50.96	9.10	--	--	--	ND<50	1.6	ND<0.5	0.65	900	130	10	8.8 5.0 1,2 DCA=8.5
11/3/2000	51.51	8.55	670	ND>50	ND<170	--	--	ND<2.5	ND<2.5	--	--	--	--
12/12/2000	53.24	6.82	--	--	--	ND<50	1.5	ND<2.5	ND<2.5	860	68	37	ND<2.5 1,2 DCA=7.3
1/8/2001	52.99	7.07	--	--	--	ND<50	ND<170	--	--	1,200	35	7.8	ND<5.0 1,2 DCA=7.3
2/6/2001	53.55	6.51	--	--	--	ND<50	1.5	ND<2.5	ND<2.5	--	--	--	
3/12/2001	52.75	7.31	--	--	--	ND<50	1.5	ND<2.5	ND<2.5	860	68	37	ND<2.5 1,2 DCA=4.6
4/20/2001	55.35	4.71	--	--	--	ND<50	1.5	ND<2.5	ND<2.5	--	--	--	
5/8/2001	52.49	7.57	51	ND<200	--	ND<170	ND<1.3	ND<1.3	ND<1.3	1,100	200	38	6.4 2.6 1,2 DCA=4.9
6/8/2001	52.34	7.72	--	--	--	ND<50	ND<170	ND<1.3	ND<1.3	--	--	--	
7/16/2001	52.24	7.82	--	--	--	ND<50	ND<170	ND<1.3	ND<1.3	--	--	--	
8/7/2001	51.91	8.15	680	ND<50	ND<170	ND<1.3	ND<1.3	ND<1.3	ND<1.3	1,100	200	38	6.4 2.6 1,2 DCA=4.9
9/17/2001	51.59	8.47	--	--	--	ND<50	ND<170	ND<1.0	ND<1.0	910	150	35	4.9 2.1 1,2 DCA=5.9
10/24/2001	51.06	9.00	--	--	--	ND<50	ND<170	ND<1.0	ND<1.0	--	--	--	
11/6/2001	50.84	9.22	--	--	--	ND<50	ND<170	ND<1.0	ND<1.0	--	--	--	
Screened Interval = 12-20 feet bgs													

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS
Fortuna Shelf; 809 Main St., Fortuna, California
LOP No. 12672; LACO No. 4563-01

WELL Sample Date	Groundwater Measurements				Depth to Water (feet)	TPHg (µg/L)	TPHd (µg/L)	TPHm (µg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethybenzene (µg/L)	Xylenes (µg/L)	MTBE (µg/L)	TBA (µg/L)	TAME (µg/L)	ETBE (µg/L)	DPE (µg/L)	Other Analytes (ng/L)
	Well Head Elevation (feet NAVD 88)	Hydraulic Head Elevation (feet NAVD 88)	Water (feet)	Depth to Water (feet)														
MW6 Continued																		
2/5/2002	54.17	5.89	710	ND>50	---	---	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	1,300	350	92	7.8	3.1
5/9/2002	53.79	6.27	630	ND>50	---	---	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	1,100	160	54	3.5	ND<3.0
8/15/2002	52.88	7.18	930	ND>50	ND<170	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	1,7	980	160	54	5.1
12/20/2002	54.47	5.59	910	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,200	480	64	4.9	2.7
2/11/2003	54.39	5.67	1,100	ND>50	ND<170	0.58	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,300	450	74	5.2	ND<4.0
5/13/2003	54.53	5.53	380	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	960	180	62	3.6	1.5
8/14/2003	51.35	8.71	720	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,000	210	72	4.8	2.1
11/4/2003	49.54	10.52	670	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,000	190	58	3.5	1.7
2/22/2004	53.95	6.11	1,100	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,100	270	64	ND<8.0	2.0
5/4/2004	52.16	7.90	450	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	480	55	29	1.8	ND<1.0
8/3/2004	50.44	9.62	160	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	180	ND<22	6.9	ND<1.0	ND<1.0
11/10/2004	51.64	8.42	ND>50	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	30	ND<10	ND<1.0	ND<1.0	ND<1.0
2/11/2005	54.72	5.34	ND>50	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	21	ND<10	ND<1.0	ND<1.0	ND<1.0
5/3/2005	54.73	5.33	ND>50	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	7	ND<10	ND<1.0	ND<1.0	ND<1.0
8/2/2005	53.94	6.12	ND>50	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	10	ND<10	ND<1.0	ND<1.0	ND<1.0
11/1/2005	52.07	7.99	ND>50	ND>50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	11	ND<10	ND<1.0	ND<1.0	All ND<1.0-3.0
MW7																		
8/4/2000	53.63	6.17	---	---	---	190	ND<170	33	2.8	2	---	67.4	3,000	700	700	220	---	---
8/7/2000	53.60	6.20	3,700	ND>50	ND<170	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	ND<1.0	1,200	280	90	42	ND<2.5
9/8/2000	52.97	6.83	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
10/12/2000	52.35	7.45	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
11/3/2000	53.50	6.30	910	110	ND<170	2.2	ND<1.0	1.2	1.9	1.2	1.2	1.2	1.2	1,200	280	90	42	ND<2.5
12/2/2000	53.78	6.02	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
1/8/2001	54.13	5.67	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
2/6/2001	54.39	5.41	1,700	280	---	5.2	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	1,800	440	160	ND<10	ND<10
3/12/2001	54.73	5.07	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
4/20/2001	54.61	5.19	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
5/8/2001	54.39	5.41	1,100	160	ND>200	6.6	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	2,000	450	200	ND<5.0	ND<5.0
6/8/2001	54.17	5.63	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
7/16/2001	54.00	5.80	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
8/7/2001	53.70	6.10	1,400	ND>50	ND<170	8.3	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	2,100	670	180	ND<10	ND<10
9/17/2001	53.39	6.41	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
10/24/2001	52.85	6.95	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---
11/6/2001	52.63	7.17	1,400	ND>50	ND<170	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	1,800	430	150	4.6	ND<3.0
55.40	4.40	1,500	ND>50	ND>50	ND<170	31	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	2,000	750	190	7.9	3.8
54.88	4.92	1,100	ND>50	ND>50	ND<170	51	ND<2.5	ND<2.5	ND<2.5	ND<2.5	ND<2.5	ND<2.5	ND<2.5	1,800	280	96	ND<5.0	ND<5.0
53.06	6.74	1,500	53	ND>50	ND<170	4.6	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	2.6	1,500	290	110	5.3
12/20/2002	55.83	3.97	750	ND>50	ND<170	0.64	ND>50	0.57	1,200	510	510	78	78	ND<8.0	ND<8.0	ND<8.0	ND<8.0	ND<8.0
55.32	4.48	1,400	ND>50	ND>50	ND<170	36	0.69	0.74	0.61	1,300	550	64	64	1,000	190	64	3.4	1.9
53.78	6.02	620	ND>50	ND>50	ND<170	18	0.64	0.79	1.21	1,21	1,21	1,21	1,21	1,000	190	64	3.4	1.9
51/3/2003	52.90	6.90	830	54	ND>50	1.4	ND>50	ND>50	ND>50	ND>50	ND>50	ND>50	ND>50	1,100	250	85	4.0	1.1
8/14/2003	52.04	7.76	570	ND>50	ND>50	1.4	ND>50	ND>50	ND>50	ND>50	ND>50	ND>50	ND>50	140	48	2.7	ND<1.0	1,2-DCA=1.2
55.82	3.98	1,300	50	ND>50	ND<170	7.6	ND>50	0.56	ND>50	ND>50	ND>50	ND>50	ND>50	1,200	240	69	4.6	ND<4.5
54.43	5.37	800	ND>50	ND>50	ND<170	ND<50	ND<50	ND<50	ND<50	ND<50	ND<50	ND<50	ND<50	870	ND>50	67	2.8	ND<1.0

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS

Fortuna Shell: 809 Main St., Fortuna, California
LIDP No. 12672; LACO No. 453.01

WELL Sample Date	Groundwater Measurements			Analytical Results						Other Analytes ($\mu\text{g/L}$)			
	Well Head Elevation (feet NAVD 88)	Hydraulic Head Elevation (feet NAVD 88)	Depth to Water (feet)	TPH _E ($\mu\text{g/L}$)	TPHd ($\mu\text{g/L}$)	TPHmo ($\mu\text{g/L}$)	Benzene ($\mu\text{g/L}$)	Toluene ($\mu\text{g/L}$)	MTBE ($\mu\text{g/L}$)	TBA ($\mu\text{g/L}$)	ETBE ($\mu\text{g/L}$)	DPE ($\mu\text{g/L}$)	
MW7 Continued													
8/3/2004	52.23	7.57	7.0	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<10	42	48	2.4
11/10/2004	53.67	6.13	ND<50	56	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<10	ND<1.0	ND<1.0	ND<1.0
2/1/2005	55.14	4.56	140	ND<50	ND<170	0.66	ND<0.50	ND<0.50	ND<0.50	ND<10	130	ND<10	5.3
5/3/2005	55.13	4.67	150	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<20	140	ND<20	7.3
8/2/2005	53.78	6.02	170	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<30	150	ND<30	5.7
11/1/2005	52.68	7.12	230	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<65	280	ND<65	12
													All ND<1.0-3.0

WELL Sample Date	Groundwater Measurements			Analytical Results						Other Analytes ($\mu\text{g/L}$)				
	Well Head Elevation (feet NAVD 88)	Hydraulic Head Elevation (feet NAVD 88)	Depth to Water (feet)	TPH _E ($\mu\text{g/L}$)	TPHd ($\mu\text{g/L}$)	TPHmo ($\mu\text{g/L}$)	Benzene ($\mu\text{g/L}$)	Toluene ($\mu\text{g/L}$)	MTBE ($\mu\text{g/L}$)	TBA ($\mu\text{g/L}$)	ETBE ($\mu\text{g/L}$)	DPE ($\mu\text{g/L}$)		
MW8														
8/4/2000	52.05	7.53	Screened Interval = 15-20 feet bgs	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<10	11,000	2,100	36	
8/7/2000	50.81	8.77	4,800	98	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<10	—	—	5.4	
9/8/2000	51.60	7.98	—	—	—	—	—	—	—	—	—	—	—	
10/12/2000	51.17	8.41	—	—	—	—	—	—	—	—	—	—	—	
11/3/2000	52.58	7.00	3,200	65	ND<170	ND<4.0	ND<4.0	ND<4.0	ND<4.0	ND<10	1,300	50	56	
12/12/2000	52.82	6.76	—	—	—	—	—	—	—	—	—	—	—	
1/8/2001	52.77	6.81	—	—	—	—	—	—	—	—	—	—	—	
2/6/2001	53.29	6.29	5,700	ND<50	ND<170	ND<10	ND<10	ND<10	ND<10	ND<10	1,100	61	47	
3/12/2001	53.66	5.92	—	—	—	—	—	—	—	—	—	—	—	
4/20/2001	53.26	6.32	—	—	—	—	—	—	—	—	—	—	—	
5/8/2001	52.85	6.73	4,600	ND<50	ND<200	ND<6.3	ND<6.3	ND<6.3	ND<6.3	ND<10	6,900	620	33	
6/8/2001	52.70	6.88	—	—	—	—	—	—	—	—	—	—	—	
7/16/2001	52.58	7.00	—	—	—	—	—	—	—	—	—	—	—	
51.61	7.97	4,700	ND<50	ND<170	ND<13	ND<13	ND<13	ND<13	ND<13	ND<13	7,600	ND<250	120	
8/7/2001	50.80	8.78	—	—	—	—	—	—	—	—	—	—	—	
9/17/2001	50.28	9.30	—	—	—	—	—	—	—	—	—	—	—	
10/24/2001	50.68	8.90	4,800	ND<50	ND<170	ND<10	ND<10	ND<10	ND<10	ND<10	7,000	920	98	
11/6/2001	53.62	5.96	2,600	ND<50	ND<50	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	6,200	860	170	
2/5/2002	53.05	6.53	2,800	ND<50	ND<170	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	6,500	850	130	
5/9/2002	52.25	7.33	4,400	ND<50	ND<170	ND<5.0	ND<5.0	ND<5.0	ND<5.0	ND<5.0	5,600	820	160	
8/15/2002	53.52	6.06	3,100	ND<50	ND<170	0.63	ND<50	ND<50	ND<50	ND<50	0.62	5,700	ND<6000	
12/20/2002	54.41	5.17	4,500	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	6,200	1,800	110	
2/11/2003	53.56	6.02	950	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	4,500	1,100	140	
8/14/2003	50.53	1,300	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	4,600	1,100	150	
11/4/2003	50.70	8.88	1,500	ND<50	ND<170	1.5	ND<50	ND<50	ND<50	ND<50	0.51	4,700	1,100	
2/2/2004	53.82	5.76	4,200	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	4,700	1,000	150	
5/4/2004	52.56	7.02	2,900	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	4,300	1,100	140	
8/3/2004	59.00	9.98	3,000	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	4,100	920	110	
11/10/2004	49.26	10.32	3,100	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	3,500	810	110	
2/1/2005	49.74	9.84	2,600	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	3,500	640	130	
5/3/2005	49.24	10.34	1,900	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<0.50	3,300	890	ND<200	
8/2/2005	48.40	11.18	1,800	ND<50	ND<170	0.88	ND<50	ND<50	ND<50	ND<50	2,500	450	97	
11/1/2005	50.93	8.65	1,200	110	ND<170	1.3	ND<50	ND<50	ND<50	ND<50	ND<50	3,000	420	80
													All ND<1.0-3.0	

WELL Sample Date	Groundwater Measurements			Analytical Results						Other Analytes ($\mu\text{g/L}$)				
	Well Head Elevation (feet NAVD 88)	Hydraulic Head Elevation (feet NAVD 88)	Depth to Water (feet)	TPH _E ($\mu\text{g/L}$)	TPHd ($\mu\text{g/L}$)	TPHmo ($\mu\text{g/L}$)	Benzene ($\mu\text{g/L}$)	Toluene ($\mu\text{g/L}$)	MTBE ($\mu\text{g/L}$)	TBA ($\mu\text{g/L}$)	ETBE ($\mu\text{g/L}$)	DPE ($\mu\text{g/L}$)		
MW9														
11/6/2001	46.34	13.01	160	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<10	210	ND<5.0	17	
2/5/2002	52.11	7.24	92	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<10	210	ND<5.0	20	
5/9/2002	49.62	9.73	88	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<10	180	ND<5.0	13	
8/15/2002	49.90	9.45	100	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	ND<10	1.8	81	ND<5.0	71
													All ND<1.0-3.0	

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS

Fortuna Shell; 809 Main St., Fortuna, California
LOP No. 12672, LACO No. 4553.01

WELL Sample Date	Well Head Elevation (feet NAVD 88)	Groundwater Measurements	Analytical Results							Other Analytes ($\mu\text{g/L}$)	
			Hydraulic Head (feet NAVD 88)	Depth to Water (feet)	TPHg ($\mu\text{g/L}$)	TPHd ($\mu\text{g/L}$)	TPHmo ($\mu\text{g/L}$)	Benzene ($\mu\text{g/L}$)	Toluene ($\mu\text{g/L}$)	MTBE ($\mu\text{g/L}$)	
MW9 Continued											
12/20/2002	51.46	7.89	ND<50	---	ND<50	ND<170	ND<50	ND<50	ND<50	0.53	30
2/1/2003	53.66	5.69	51	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	29	ND<20
5/13/2003	52.43	6.92	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	10	ND<20
8/14/2003	49.68	9.67	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	12	ND<20
11/4/2003	49.12	10.23	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	21	ND<20
2/22/2004	52.79	6.56	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	10	ND<10
5/4/2004	51.06	8.29	76	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	7.8	ND<10
8/3/2004	49.38	9.87	65	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	5.1	ND<10
11/10/2004	50.28	9.07	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	6.8	ND<10
2/21/2005	51.69	7.66	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	4.3	ND<10
5/3/2005	51.29	8.06	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	4.1	ND<10
8/2/2005	50.11	9.24	ND<50	---	ND<50	ND<170	ND<50	ND<50	ND<50	2.7	ND<10
11/1/2005	49.14	10.21	ND<50	---	ND<50	ND<170	ND<50	ND<50	ND<50	5.8	ND<10
MW10											
11/6/2001	48.64	10.55	61	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	82	17
2/5/2002	52.12	7.07	55	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	47	11
5/9/2002	51.17	8.02	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	3.4	ND<5.0
8/15/2002	48.04	11.15	87	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	1.3	ND<5.0
12/20/2002	51.68	7.51	190	2,800	ND<50	ND<170	ND<50	ND<50	ND<50	41	ND<20
2/11/2003	45.71	13.48	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	63	ND<20
5/13/2003	48.49	10.70	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	44	ND<20
8/14/2003	47.35	11.64	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	15	ND<20
11/4/2003	46.54	12.65	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	38	ND<20
2/2/2004	48.11	11.08	86	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	45	ND<20
5/4/2004	47.69	11.50	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	52	ND<20
8/3/2004	46.27	12.92	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	15	ND<10
11/10/2004	46.38	12.61	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	28	ND<10
2/1/2005	50.36	8.83	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	11	ND<10
5/3/2005	49.79	9.40	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	9	ND<10
8/2/2005	49.01	10.18	ND<50	---	ND<50	ND<170	ND<50	ND<50	ND<50	ND<5.0	ND<10
11/1/2005	49.35	9.84	99	---	ND<50	ND<170	ND<50	ND<50	ND<50	4.1	ND<10
MW11											
11/6/2001	47.85	11.36	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	10	ND<50
2/5/2002	50.97	8.24	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	6.3	ND<50
5/9/2002	50.45	8.76	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	1.1	ND<5.0
8/15/2002	48.00	11.21	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	0.52	1.2
12/20/2002	51.92	7.29	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	ND<5.0	ND<20
2/11/2003	50.79	8.42	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	2.8	ND<20
5/13/2003	51.24	7.97	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	ND<1.0	ND<20
8/14/2003	48.11	11.10	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	2.1	ND<20
11/4/2003	45.99	13.22	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	9.2	ND<20
2/1/2004	51.18	8.03	52	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	18	ND<10
5/4/2004	50.04	9.17	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	2.7	ND<10
8/3/2004	47.41	11.80	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	1.8	ND<10
11/10/2004	49.59	9.62	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	1.7	ND<10
2/1/2005	50.38	8.83	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	3.7	ND<10
5/3/2005	49.76	9.45	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	3.0	ND<10
8/2/2005	48.76	10.45	ND<50	---	ND<50	ND<170	ND<50	ND<50	ND<50	2.0	ND<10
11/1/2005	47.51	11.70	ND<50	---	ND<50	ND<170	ND<50	ND<50	ND<50	2.2	ND<10
MW11											
11/6/2001	59.21	Screened Interval = 12.5-15.5 feet logs							ND<50	10	ND<50
2/5/2002	50.97	8.24	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	6.3	ND<50
5/9/2002	50.45	8.76	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	1.1	ND<5.0
8/15/2002	48.00	11.21	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	0.52	1.2
12/20/2002	51.92	7.29	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	ND<5.0	ND<20
2/11/2003	50.79	8.42	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	ND<5.0	ND<20
5/13/2003	51.24	7.97	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	ND<1.0	ND<20
8/14/2003	48.11	11.10	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	ND<5.0	ND<20
11/4/2003	45.99	13.22	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	9.2	ND<20
2/1/2004	51.18	8.03	52	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	18	ND<10
5/4/2004	50.04	9.17	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	2.7	ND<10
8/3/2004	47.41	11.80	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	1.8	ND<10
11/10/2004	49.59	9.62	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	1.7	ND<10
2/1/2005	50.38	8.83	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	3.7	ND<10
5/3/2005	49.76	9.45	ND<50	ND<50	ND<50	ND<170	ND<50	ND<50	ND<50	3.0	ND<10
8/2/2005	48.76	10.45	ND<50	---	ND<50	ND<170	ND<50	ND<50	ND<50	2.0	ND<10
11/1/2005	47.51	11.70	ND<50	---	ND<50	ND<170	ND<50	ND<50	ND<50	2.2	ND<10
All ND<1.0-3.0											

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS

Fortuna Shell; 899 Main St., Fortuna, California
LID No. 12672; LACO No. 4563.01

WELL Sample Date	Well Head Elevation (feet NAVD 88)	Groundwater Measurements						Analytical Results						
		Hydraulic Head (feet NAVD 88)	Depth to Water (feet)	TPHg (µg/L)	TPHmo (µg/L)	TPHd (µg/L)	Benzene (ng/L)	Toluene (ng/L)	Ethylbenzene (ng/L)	Total Xylenes (ng/L)	MTBE (ng/L)	TBA (ng/L)	ETBE (ng/L)	DPE (µg/L)
MW12	59.09	Screened Interval = 12.5-15 feet bgs												
11/6/2001	-48.95	11.04	1,700	ND<50	ND<170	ND<2.5	ND<2.5	ND<2.5	ND<2.5	2,400	250	51	11	ND<1.0
2/5/2002	Well was inaccessible			---	---	---	---	---	---	---	---	---	---	---
5/9/2002	50.67	8.42	1,300	ND<50	ND<170	ND<2.5	ND<2.5	ND<2.5	ND<2.5	2,900	110	75	6.3	ND<5.0
8/15/2002	48.97	10.12	1,800	ND<50	ND<170	ND<2.5	ND<2.5	ND<2.5	ND<2.5	2,300	96	92	9.4	ND<5.0
12/20/2002	52.42	6.67	1,800	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	2,600	430	94	9.0	3.3
2/11/2003	Well was inaccessible			---	---	---	---	---	---	---	---	---	---	---
5/13/2003	51.41	7.68	470	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,400	94	72	5.0	1.7
8/14/2003	48.71	10.38	740	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,600	76	82	6.6	2.3
11/4/2003	48.20	10.89	840	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,600	ND<50	68	4.7	1.9
2/2/2004	51.69	7.40	1,500	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,700	ND<60	72	5.6	2.3
5/4/2004	50.28	8.81	1,200	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,400	ND<45	69	4.5	1.8
8/3/2004	48.34	10.75	2,100	76	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,300	110	96	9.5	2.7
11/10/2004	49.78	9.31	1,200	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	1,200	45	47	3.4	1.6
2/1/2005	50.58	8.51	990	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	950	56	40	3.4	1.5
5/3/2005	49.98	9.11	640	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	720	ND<15	34	3.2	1.6
8/2/2005	49.07	10.02	750	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	790	ND<10	32	2.6	1.3
11/1/2005	48.96	11.03	340	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	580	ND<10	21	1.8	1.1
All ND<1.0-3.0														
MW13	58.86	Screened Interval = 12.5-15 feet bgs												
11/6/2001	48.32	10.04	2,000	ND<50	ND<170	ND<2.5	ND<2.5	ND<2.5	ND<2.5	2,800	330	110	9.8	ND<5.0
2/5/2002	51.58	7.28	1,300	ND<50	ND<1.5	ND<1.5	ND<1.5	ND<1.5	ND<1.5	2,800	370	160	11.0	4.0
5/9/2002	Well was inaccessible			---	---	---	---	---	---	---	---	---	---	---
8/15/2002	51.01	7.85	1,000	ND<50	ND<1.5	ND<1.0	ND<1.0	ND<1.0	ND<1.0	1,200	51	70	5.7	ND<2.0
12/20/2002	53.68	5.18	54	ND<50	570	ND<0.50	1.0	ND<0.50	ND<0.50	38	ND<20	18	ND<1.0	ND<1.0
2/11/2003	Well was inaccessible			---	---	---	---	---	---	---	---	---	---	---
5/13/2003	52.06	6.80	ND<50	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	21	ND<20	19	ND<1.0	ND<1.0
8/14/2003	49.48	9.38	160	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	260	ND<20	13	ND<1.0	ND<1.0
11/4/2003	49.12	9.74	170	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	210	ND<20	13	ND<1.0	ND<1.0
5/2/2004	52.09	6.77	330	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	360	ND<20	13	ND<2.5	ND<1.0
5/4/2004	50.89	7.97	270	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	280	ND<10	12	ND<2.5	ND<1.0
8/3/2004	49.13	9.73	960	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	820	ND<100	34	2.2	1.3
11/10/2004	50.52	8.34	400	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	370	ND<25	16	ND<2.0	ND<1.0
2/1/2005	51.10	7.76	270	ND<50	270	ND<0.50	ND<0.50	ND<0.50	ND<0.50	260	ND<40	95	ND<1.0	ND<1.0
5/3/2005	50.60	8.26	63	ND<50	ND<170	ND<0.50	ND<0.50	ND<0.50	ND<0.50	63	ND<10	17	ND<1.0	ND<1.0
8/2/2005	49.85	9.01	200	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	230	ND<10	71	ND<1.0	ND<1.0
11/1/2005	48.92	9.94	250	---	---	ND<0.50	ND<0.50	ND<0.50	ND<0.50	390	ND<10	14	ND<1.0	ND<1.0
All ND<1.0-3.0														
MW14	61.04	Screened Interval = 5-10 feet bgs												
11/10/2004	53.39	7.15	1,100	150	ND<170	0.62	ND<0.50	1.2	ND<0.50	ND<20	ND<15	1.7	ND<1.0	ND<1.0
2/1/2005	55.76	5.28	580	120	ND<170	0.77	ND<0.50	0.65	ND<0.50	ND<20	ND<10	ND<1.0	ND<1.0	ND<1.0
5/3/2005	55.70	5.34	1,000	140	ND<170	1.3	0.55	1.3	0.59	ND<14	ND<10	1.2	ND<1.0	ND<1.0
8/2/2005	54.37	6.67	880	160	ND<170	0.93	ND<0.50	1.1	ND<0.50	ND<14	ND<10	ND<1.0	ND<1.0	ND<1.0
11/1/2005	53.57	7.47	920	92	ND<190	0.88	ND<0.50	1.3	ND<0.50	6.6	ND<10	12	ND<28	2.6
All ND<1.0-3.0														
MW15	60.80	Screened Interval = 5-10 feet bgs												
11/10/2004	54.37	6.43	1,600	90	ND<170	97	2.7	15	6.3	70	ND<40	2.6	ND<1.0	ND<1.0
2/1/2005	56.34	4.46	1,100	120	ND<170	40	1.4	8.9	3.4	ND<30	ND<10	ND<1.0	ND<1.0	ND<1.0
5/3/2005	55.84	4.96	2,200	170	ND<170	75	2.4	15	5.74	ND<70	ND<20	1.9	ND<1.0	ND<1.0
8/2/2005	54.52	6.28	2,100	250	ND<170	120	3.5	23	7.5	ND<100	ND<30	2.4	ND<1.0	ND<1.0
11/1/2005	53.15	7.65	2,500	99	ND<210	180	4.4	35	12	ND<120	ND<28	2.6	ND<1.0	ND<1.0
All ND<1.0-3.0														

TABLE 2: WELL DATA AND GROUNDWATER ANALYTICAL RESULTS
Fortuna Shell; 809 Main St., Fortuna, California
LOP No. 12672; LACO No. 4663.01

WELL Sample Date	Well Head Elevation (feet NAVD 88)	Groundwater Measurements			Analytical Results											
		Water Elevation (feet NAVD 88)	Hydraulic Head (feet)	Depth to Water (feet)	TPHg (µg/L)	TPHd (µg/L)	TPHmo (µg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylbenzene (µg/L)	Total Xylenes (µg/L)	MTBE (µg/L)	TBA (µg/L)	ETBE (µg/L)	DIPE (µg/L)	Other Analytes (µg/L)
MW16	11/1/2004	60.24	Screened Interval = 5-10 feet bgs	54.45	5.79	3,900	200	ND<170	480	13	22	31.9	500	61	12	5.2 ND<1.0
	2/1/2005	55.75		5.49	5,600	340	ND<170	580	16	31	40.8	490	25	13	5.5 ND<1.0	
	5/3/2005	55.69		4.45	7,900	370	ND<170	580	15	35	33.7	479	300	14	4.3 ND<1.0	
	8/2/2005	54.12		6.12	4,600	570	320	680	14	22	33.6	369	220	8	3.9 ND<1.0	
	11/1/2005	53.21		7.03	6,100	860	1,800	1,000	16	27	36	430	280	11	4.5 ND<1.0 All ND<1.0-3.0	
MW17S	56.96	Screened Interval = 22.5-24.5 feet bgs		35.70	21.26	64	...	ND<50	ND<50	ND<50	ND<50	ND<50	33	ND<35	ND<1.0 ND<1.0	
	11/1/2004	34.71		22.25	180	70	ND<170	ND<50	ND<50	ND<50	ND<50	180	ND<50	ND<1.0	ND<1.0 ND<1.0	
	2/1/2005	35.13		21.83	320	ND<50	ND<170	ND<50	ND<50	ND<50	ND<50	300	ND<15	2.1	1.2	
	5/3/2005	34.51		22.45	ND<50	...	ND<50	ND<50	ND<50	ND<50	ND<50	13	ND<10	ND<1.0	ND<1.0 ND<1.0	
	8/2/2005	34.76		22.20	ND<50	...	ND<50	ND<50	ND<50	ND<50	ND<50	4.1	ND<10	ND<1.0	ND<1.0 ND<1.0	
MW17D	56.95	Screened Interval = 26-28 feet bgs		32.42	24.53	ND<50	ND<170	ND<50	ND<50	ND<50	ND<50	ND<50	5.0	ND<20	ND<1.0 ND<1.0	
	11/1/2004	32.76		24.19	120	ND<50	ND<170	ND<50	ND<50	ND<50	ND<50	110	55	ND<1.0	ND<1.0 ND<1.0	
	2/1/2005	31.95		25.00	130	ND<50	ND<170	ND<50	ND<50	ND<50	ND<50	100	ND<20	ND<1.0	ND<1.0 ND<1.0	
	5/3/2005	30.50		26.45	130	...	ND<50	ND<50	ND<50	ND<50	ND<50	50	ND<10	ND<1.0	ND<1.0 ND<1.0	
	8/2/2005	30.69		26.26	92	...	ND<50	ND<50	ND<50	ND<50	ND<50	64	ND<35	ND<1.0	ND<1.0 ND<1.0	

NOTES:

Bold results indicate analyte detection

--- sample not analyzed for parameter

ND>50 - non-detect at reporting limits shown

TPHg - total petroleum hydrocarbons as gasoline

TPHd - total petroleum hydrocarbons as diesel

TPHmo - total petroleum hydrocarbons as motor oil

Total Xylenes = sum of m,p-xylene and o-xylene

MTBE - methyl tertiary butyl ether

TBA - tertiary butyl alcohol

TAME - tertiary amyl methyl ether

ETBE - ethyl tertiary butyl ether

DIPE - di-isopropyl ether

Other Analytes Include: 1,2-dichloroethane (1,2 DCA); 1,2 dichlorobenzene; 1,3-dichlorobenzene; 1,4-dichlorobenzene; Ethylene dibromide (EDB); Methanol, Ethanol

Attachment 1



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Project Name: **Fortuna Shell - HPI**
Project No.: **4563.01**
Date: **11-1-05**
Global ID No.: **T0602300471**
PM: **CJW**

Tech: **SJD**
Mob/Demob time: **.50/.50**
Travel time: **1.25**
Time on site: **7:50**
Time off site: **1:25**
Mileage: **36**

	WELL No.:	MW11	MW10	MW9	MW3	MW6
DIAMETER (in)		2.00	2.00	2.00	2.00	2.00
SCREENED INTERVAL (ft)	12.5-15.5	12.5-15.5	12-15	5-12	12-20	
DEPTH TO WATER (ft)	11.20	9.84	10.21	7.31	7.99	
	INITIAL	FINAL	INITIAL	FINAL	INITIAL	FINAL
pH					8.4	6.5
TEMP (°C)					16.2	19.2
Ecw (μmhos)					358	248
ORP (mV)					26	-13
DO (mg/L)					0.98	0.47
OTHER (units)					—	—
	TIME				8:32	8:46
	METHOD (DHP/CB/B)				DHP	DHP
	RATE (Lpm)				0.16	0.18
	VOLUME (L)				2.25	1.75
	COLOR				LT. BROWN TINT	CLEAR
	ODOR				MED. SULFUR/FUEL/ORGANIC	LIGHT ORGANIC
	INTAKE DEPTH (FEET)				10.0	16.0
	TIME				8:48	9:30
	METHOD (DHP/CB/B)				DHP	DHP
	ANALYTES	8260 List 5	8260 List 5	8260 List 5	8260 List 5; TPHd/mo w/SGC	8260 List 5; TPHd/mo w/SGC
	TOTAL DRAWDOWN (FEET)				<u>1.05</u>	<u>2.55</u>
	REMARKS				—	—
	WELL CONDITION				TWO BOLT HOLE STRIPPED	good
	WASTE DRUMS					

DHP=DOWN HOLE PUMP CB=CHECK BALL B=BAILER FD=FIELD DUPLICATE MB=METHOD BLANK FF=FIELD FILTERED

REVISED:10/27/2005



Project Name: **Fortuna Shell - HPI**
 Project No.: **4563.01**
 Date: **11-1-05**
 Global ID No.: **T0602300471**
 PM: **CJW**

Tech: **SJD**
 Mob/Demob time: **.50/.50**
 Travel time: **1:25**
 Time on site: **7:50**
 Time off site: **1:25**
 Mileage: **36**

WELL No.:	MW12	MW7	MW13	MW1	MW4					
DIAMETER (in)	2.00	2.00	2.00	2.00	2.00					
SCREENED INTERVAL (ft)	12.5-15	10 - 15	12.5-15	6-10	5-10					
DEPTH TO WATER (ft)	11.03	7.13	9.24	7.24	7.45					
	INITIAL	FINAL	INITIAL	FINAL	INITIAL	FINAL	INITIAL	FINAL		
pH			6.3	6.1			6.4	6.0	6.3	6.1
TEMP (°C)			16.1	17.5			17.6	19.7	16.2	17.9
Eow (μmhos)			219	206			196	171	212	202
ORP (mV)			40	27			-20	-19	20	7
DO (mg/L)			1.16	0.49			0.84	0.38	1.14	0.36
OTHER (units)										
	TIME		9:49	9:57			10:40	10:48	10:14	10:22
PURGE	METHOD (DHP/CB/B)		DHP				DHP		DHP	
VOLUME (L)			0.19				0.19		0.18	
COLOR			CLEAR	CLEAR			CLEAR	LT. GREY TINT	CLEAR	SLIGHT GREY TINT
ODOR			LIGHT SULFUR/SWEET				LIGHT RUBBER		med. RUBBER	
INTAKE DEPTH (FEET)			12.0				9.5		9.5	
SAMPLE	TIME		9:59				10:50		10:24	
	METHOD (DHP/CB/B)		DHP				DHP		DHP	
ANALYTICS			8260 List 5;				8260 List 5;		8260 List 5;	
TOTAL DRAWDOWN (FEET)	8260 List 5		TPHd/mo w/SGC		8260 List 5		TPHd/mo w/SGC		TPHd/mo w/SGC	
REMARKS			1.57				0.55		0.70	
WELL CONDITION		good				good			good	
WASTE DRUMS										

DHP=DOWN HOLE PUMP CB=CHECK BALL B=BAILER FD=FIELD DUPLICATE MB=METHOD BLANK FF=FIELD FILTERED



Project Name: Fortuna Shell - HPI		Tech: SJD							
Project No.: 4563.01		Mob/Demob time: 50.50							
Date: 11-1-05		Travel time: 1.25							
Global ID No.: T0602300471		Time on site: 7:50							
PM: CJW		Time off site: 1:25							
Mileage: 36									
WELL No.:	MW14	MW15	MW16	MW17S	MW17D				
DIAMETER (in)	1.50	1.50	1.50	1.50	1.50				
SCREENED INTERVAL (ft)	5-10	5-10	5-10	22.5-24.5	26-28				
DEPTH TO WATER (ft)	7.47	7.65	7.93	22.20	26.25				
FIELD INTRINSICS DEPTH MEASUREMENTS ARE REFERENCED TO TOP OF CASING	pH	INITIAL 6.3	FINAL 6.3	INITIAL	FINAL	INITIAL	FINAL	INITIAL	FINAL
	TEMP (°C)	18.5	18.46						
	E _{dw} (μmhos)	215	213						
	ORP (mV)	-15	-30						
	DO (mg/L)	1.17	0.88						
	OTHER (units)								
	TIME	11:17	11:21			—	—		
	METHOD (DHP/CB/B)	DHP				DHP			
	RATE (Lpm)	0.13							
	VOLUME (L)	.50							
PURGE	COLOR	CLEAR	CLOUDY			MED. GREY SEDIMENT	LT. GREY TURBID		
	ODOR	MED. SKUNKY/RUBBER	LIGHT SHOE STORE			MED.	SHOE STORE		
	INTAKE DEPTH (FEET)	9.5		9.75		9.75			
	TIME	11:23		11:45		12:20			
	METHOD (DHP/CB/B)	DHP		DHP		DHP			
SAMPLE	ANALYTICS	8260 List 5; TPHd/mo w/SGC		8260 List 5; TPHd/mo w/SGC		8260 List 5; TPHd/mo w/SGC		8260 List 5	
	TOTAL DRAWDOWN (FEET)	2.15		2.22		2.42			
	REMARKS	UNABLE TO COMPLETE INTRINSICS - WELL NOT RECOVERING		PULLED SAMPLE FIRST - WELL NOT		PULLED SAMPLE + FD FIRST - WELL NOT			
WELL CONDITION	good	LIMITED VOLUME FOR TPHd	good	RECOVERING NO INTRINSICS LIMITED TPHd	good	RECOVERING NO INTRINSICS LIMITED VOLUME			
WASTE DRUMS	SAMPLE								

DHP=DOWN HOLE PUMP CB=CHECK BALL B=BAILER FD=FIELD DUPLICATE MB=METHOD BLANK FF=FIELD FILTERED



Project Name: **Fortuna Shell - HPI**
 Project No.: **4563.01**
 Date: **11-1-05**
 Global ID No.: **T0602300471**
 PM: **CJW**

Tech: **SJD**
 Mob/Demob time: **.50/.50**
 Travel time: **1:25**
 Time on site: **7:50**
 Time off site: **1:25**
 Mileage: **36**

WELL No.:	MW2	MW8	MW5					
DIAMETER (in)	2.00	2.00	2.00					
SCREENED INTERVAL (ft)	5-10	15-20	5-10					
DEPTH TO WATER (ft)	7.93	8.65	7.77					
	INITIAL	FINAL	INITIAL	FINAL	INITIAL	FINAL	INITIAL	FINAL
pH			6.7	6.3				
TEMP (°C)			17.9	18.5				
E _{ceq} (μmhos)			204	196				
ORP (mV)			9	10				
DO (mg/L)			1.78	0.45				
OTHER (units)								
FIELD INTRINSICS	TIME		12:43	12:51				
	METHOD (DHP/CB/B)		DHP					
	RATE (Lpm)		0.19					
	VOLUME (L)		1.50					
	COLOR	CLEAR	CLEAR	GREY TURBID	→			
	ODOR	med.	SHOE STORE	VERY STRONG FUEL				
	INTAKE DEPTH (FEET)		17.0					
PURGE	TIME		12:53		1:02			
	METHOD (DHP/CB/B)		DHP		3/4" B			
	ANALYTICS	8260 List 5; TPHd/mo w/SGC	8260 List 5; TPHd/mo w/SGC	8260 List 5; TPHd/mo w/SGC				
	TOTAL DRAWDOWN (FEET)		1.45					
	REMARKS			T+P = NO FP				
WELL CONDITION		good	good					
WASTE DRUMS								

DHP=DOWN HOLE PUMP CB=CHECK BALL B=BAILER FD=FIELD DUPLICATE MB=METHOD BLANK FF=FIELD FILTERED



ACO ASSOCIATES

CONSULTING ENGINEERS

21 West Fourth Street, Eureka, CA 95501

TEL 707.443.5054

FAX 707.443.0553

Project Name: FORTUNA SHELL - HPI
Project No.: 4563.01

Tech: SJD
Date: 11-1-05



LACO ASSOCIATES

CONSULTING ENGINEERS

21 West Fourth Street, Eureka, CA 95501

TEL 707.443.5054

FAX 707.443.0553

Project Name: FORTUNA SHELL - HPI
Project No.: 4563.01

Tech: SJD

Date: 11-1-05



Project Name: **Fortuna Shell - HPI**
 Project No.: **4563.01**
 Date: **11-1-05**
 Global ID No.: **T0602300471**
 PM: **CJW**

Tech: **SJD/RD**
 Mob/Demob time: **50/25**
 Travel time: **.75**
 Time on site: **7:30**
 Time off site: **1:25**
 Mileage: **36**

WELL No.:	MW11	MW10	MW9	MW3	MW6
DIAMETER (in)	2.00	2.00	2.00	2.00	2.00
SCREENED INTERVAL (ft)	12.5-15.5	12.5-15.5	12-15	5-12	12-20
DEPTH TO WATER (ft)	11.70	9.84	10.21		
	INITIAL	FINAL	INITIAL	FINAL	INITIAL
pH	6.9	6.3	7.4	6.9	7.2
TEMP (°C)	15.4	16.2	16.7	17.8	16.1
Ecv (μmhos)	472	443	355	343	430
ORP (mV)	UR	-91	-79	-86	UR
DO (mg/L)	0.81	0.97	0.87	1.32	1.99
OTHER (units)	—	—	—	—	—
TIME	8:31	8:39	9:29	9:35	9:51
METHOD (DHP/CB/B)	DHP	DHP	DHP		
RATE (Lpm)	0.25	0.25		0.17	
VOLUME (L)	2.0	1.5		1.0	
COLOR	CLEAR	CLEAR	CLEAR	CLEAR	CLEAR
ODOR	MED SULFUR	LIGHT SULFUR LIGHT RUSTY		MED SULFUR LIGHT RUSTY	
INTAKE DEPTH (FEET)	13.0	13.0		13.5	
TIME	8:44	9:37		9:59	
METHOD (DHP/CB/B)	DHP	DHP		DHP	
ANALYTICS	8260 List 5	8260 List 5		8260 List 5; TPHd/mo w/SGC	8260 List 5; TPHd/mo w/SGC
TOTAL DRAWDOWN (FEET)	1.47	1.91		1.72	
REMARKS	—	—	—	—	—
WELL CONDITION	GOOD	GOOD	GOOD		
WASTE DRUMS					

DHP=DOWN HOLE PUMP CB=CHECK BALL B=BAILER FD=FIELD DUPLICATE MB=METHOD BLANK FF=FIELD FILTERED



Project Name: **Fortuna Shell - HPI**
 Project No.: **4563.01**
 Date: **11-1-05**
 Global ID No.: **T0602300471**
 PM: **CJW**

Tech: **SJD / RJD**
 Mob/Demob time: **1501.25**
 Travel time: **.75**
 Time on site: **7:30**
 Time off site: **1:25**
 Mileage: **36**

WELL No.	MW12	MW7	MW13	MW1	MW4	
DIAMETER (in)	2.00	2.00	2.00	2.00	2.00	
SCREENED INTERVAL (ft)	12.5-15	10 - 15	12.5-15	6-10	5-10	
DEPTH TO WATER (ft)	11.03		9.44			
	INITIAL	FINAL	INITIAL	FINAL	INITIAL	FINAL
pH	6.3	6.1		6.9	6.8	
TEMP (°C)	17.4	18.5		18.2	18.3	
E _{ew} (μmhos)	536	523		554	557	
ORP (mV)	-70	-76		wr	wr	
DO (mg/L)	0.67	0.86		0.81	1.62	
OTHER (units)						
	TIME	10:21	10:29		10:49	10:55
PURGE	METHOD (DHP/CB/B)	DHP		DHP		
VOLUME (L)	RATE (Lpm)	0.19		0.17		
COLOR	VOLUME (L)	1.5		1.0		
ODOR	COLOR	CLEAR CLEAR		CLEAR CLEAR		
INTAKE DEPTH (FEET)	ODOR	LIGHT SWEET		LIGHT SWEET		
	INTAKE DEPTH (FEET)	13.5		13.5		
SAMPLE	TIME	10:31		10:57		
	METHOD (DHP/CB/B)	DHP		DHP		
	ANALYTES	8260 List 5;		8260 List 5;		8260 List 5;
	TOTAL DRAWDOWN (FEET)	TPHd/mo w/SGC		TPHd/mo w/SGC		TPHd/mo w/SGC
	REMARKS	0.44		1.38		
	WELL CONDITION	Good		Good		
	WASTE DRUMS					

DHP=DOWN HOLE PUMP CB=CHECK BALL B=BAILER FD=FIELD DUPLICATE MB=METHOD BLANK FF=FIELD FILTERED



Project Name: **Fortuna Shell - HPI**
 Project No.: **4563.01**
 Date: **11-1-05**
 Global ID No.: **T0602300471**
 PM: **CJW**

Tech: **SJD / RLD**
 Mob/Demob time: **.50/.25**
 Travel time: **.75**
 Time on site: **7:30**
 Time off site: **1:25**
 Mileage: **36**

	MW14	MW15	MW16	MW17S	MW17D
WELL No.:	1.50	1.50	1.50	1.50	1.50
DIAMETER (in)	5-10	5-10	5-10	22.5-24.5	26-28
SCREENED INTERVAL (ft) DEPTH TO WATER (ft)				22.20	26.36
FIELD INTRINSICS	INITIAL FINAL	INITIAL FINAL	INITIAL FINAL	INITIAL FINAL	INITIAL FINAL
pH					
TEMP (°C)					
Ecw (µmhos)					
ORP (mV)					
DO (mg/L)					
OTHER (units)					
DEPTH MEASUREMENTS ARE REFERENCED TO TOP OF CASING					
PURGE	TIME				
METHOD (DHP/CB/B)					
RATE (Lpm)					
VOLUME (L)					
COLOR					
ODOR					
INTAKE DEPTH (FEET)					
SAMPLE	TIME				
METHOD (DHP/CB/B)					
ANALYTES	8260 List 5; TPHd/mo w/SGC	8260 List 5; TPHd/mo w/SGC	8260 List 5; TPHd/mo w/SGC	8260 List 5	8260 List 5
TOTAL DRAWDOWN (FEET)					
REMARKS					
WELL CONDITION				Good	Good
WASTE DRUMS					



Project Name: **Fortuna Shell - HPI**
Project No.: **4563.01**
Date: **11-1-05**
Global ID No.: **T0602300471**
PM: **CJW**

Tech: **SJD / RLD**
Mob/Demob time: **.50/.25**
Travel time: **.75**
Time on site: **7:30**
Time off site: **1:25**
Mileage: **36**

	MW2	MW8	MW5				
WELL No.:							
DIAMETER (in)	2.00	2.00	2.00				
SCREENED INTERVAL (ft)	5-10	15-20	5-10				
DEPTH TO WATER (ft)	7.07						
	INITIAL	FINAL	INITIAL	FINAL	INITIAL	FINAL	INITIAL
pH	6.5	6.3					
TEMP (°C)	18.3	18.7					
Ecw (μmhos)	588	400					
ORP (mV)	-99	46					
DO (mg/L)	0.45	0.91					
OTHER (units)							
DEPTH MEASUREMENTS ARE REFERENCED TO TOP OF CASING	TIME	11:21	11:29				
	METHOD (DHP/CB/B)	DHP					
	RATE (Lpm)	0.125					
	VOLUME (L.)	10					
	COLOR	CLEAR	CLEAR				
	ODOR	STRONG FUEL MED SULFIDE					
	INTAKE DEPTH (FEET)	8.0					
PURGE	TIME	11:31					
	METHOD (DHP/CB/B)	DHP					
	ANALYTES	8260 List 5; TPHd/mo w/SGC	8260 List 5; TPHd/mo w/SGC	8260 List 5; TPHd/mo w/SGC			
	TOTAL DRAWDOWN (FEET)	0.86					
	REMARKS						
WELL CONDITION	Good						
WASTE DRUMS							

DHP=DOWN HOLE PUMP CB=CHECK BALL B=BAILER FD=FIELD DUPLICATE MB=METHOD BLANK FF=FIELD FILTERED



Project Name: FORTUNE SHELL - HPI
Project No.: HS63.01

Tech: PLD

Date: 11-1-05

WELL ID:	METER ACCURACY RANGE					WELL ID:					
	+/- 0.2 pH	+/- 0.5 °C	+/- 20 µmhos	+/- 2 mV	+/- 0.3 mg/L	TIME	pH	TEMP (°C)	Ecw (µmhos)	ORP (mV)	DO (mg/L)
TIME	pH	TEMP (°C)	Ecw (µmhos)	ORP (mV)	DO (mg/L)	9:31	7.1	16.9	344	-82	1.44
9:33	6.5	15.1	456	-96	1.54	9:33	6.9	17.7	342	-85	1.40
9:35	6.4	15.6	449	-94	1.53	9:35	6.9	17.8	343	-86	1.38
9:37	6.3	16.2	445	-92	1.07						
9:39	6.3	16.2	443	-91	0.97						
WELL ID: MW01											
TIME	pH	TEMP (°C)	Ecw (µmhos)	ORP (mV)	DO (mg/L)	TIME	pH	TEMP (°C)	Ecw (µmhos)	ORP (mV)	DO (mg/L)
9:53	7.1	16.2	414	ur	0.73	10:23	6.1	17.9	530	-68	1.79
9:55	7.1	16.2	413	ur	0.63	10:25	6.1	18.6	535	-73	1.22
9:57	7.0	16.0	413	ur	0.60	10:27	6.1	18.5	525	-75	0.89
						10:29	6.1	18.5	523	-76	0.86
WELL ID: MW13											
TIME	pH	TEMP (°C)	Ecw (µmhos)	ORP (mV)	DO (mg/L)	TIME	pH	TEMP (°C)	Ecw (µmhos)	ORP (mV)	DO (mg/L)
10:51	6.9	18.1	531	ur	1.45	11:23	6.4	18.6	385	ur	1.20
10:53	6.8	18.2	559	ur	1.54	11:25	6.4	18.6	395	ur	1.17
10:55	6.8	18.3	557	ur	1.62	11:27	6.3	18.7	399	ur	0.98
						11:29	6.3	18.7	400	ur	0.91



LACO ASSOCIATES

CONSULTING ENGINEERS

21 West Fourth Street, Eureka, CA 95501

TEL 707.443.5054

FAX 707.443.0553

Project Name:

FORTUNA SHELL - HPI

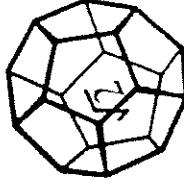
Project No.: 4563.01

Tech: SJD/BSB

Date: 11-1-05

NORTH COAST LABORATORIES LTD.

5680 West End Road • Arcata • CA 95521-9202
707-822-4649 Fax 707-822-6811



Chain of Custody

Attention: Accounts Payable

Results & Invoice to: Laco Associates

Address: 21 W. 4th St. Eureka CA 95501

Phone:

Copies of Report to: LACO ; Chris Watt

Sampler (Sign & Print): SID

PROJECT INFORMATION

Project Number: 4563_01

Project Name: FORTUNA SHELL

Purchase Order Number: task 3031

ANALYSIS 8260 List 5
CONTAINER PRESERVATIVE

TPHd/mo w/SGC
8260 List 5

LABORATORY NUMBER:	
TAT: <input type="checkbox"/> 24 Hr <input type="checkbox"/> 48 Hr <input checked="" type="checkbox"/> 5 Day <input type="checkbox"/> 5-7 Day	
<input checked="" type="checkbox"/> STD (2-3 Wk) <input type="checkbox"/> Other: _____	
PRIOR AUTHORIZATION IS REQUIRED FOR RUSHES	
REPORTING REQUIREMENTS: State Forms	
Preliminary: <input checked="" type="checkbox"/> FAX <input type="checkbox"/> Verbal <input type="checkbox"/> By: _____	
Final Report: <input type="checkbox"/> FAX <input type="checkbox"/> Verbal <input type="checkbox"/> By: _____	
CONTAINER CODES: 1—1/2 gal. pl; 2—250 ml pl; 3—500 ml pl; 4—1 L Nalgene; 5—250 ml BG; 6—500 ml BG; 7—1 L BG; 8—1 L cg; 9—40 ml VOA; 10—125 ml VOA; 11—4 oz glass jar; 12—8 oz glass jar; 13—brass tube; 14—other	
PRESERVATIVE CODES: a—HNO ₃ ; b—HCl; c—H ₂ SO ₄ ; d—Na ₂ S ₂ O ₃ ; e—NaOH; f—C ₂ H ₅ OH; g—other	

LAB ID	SAMPLE ID	DATE	TIME	MATRIX*
4563-MW1-W	11-1-05	AM	GW	3 1
4563-MW2-W				3 1
4563-MW3-W				3 1
4563-MW4-W				3 1
4563-MW5-W				3 1
4563-MW6-W				3 1
4563-MW7-W				3 1
4563-MW8-W				3 1
4563-MW9-W				3 1
4563-MW10-W			PM	3

RElinquished BY (Sign & Print)	DATE/TIME	RECEIVED BY (Sign)	DATE/TIME

SAMPLE DISPOSAL
✓ NCL Disposal of Non-Contaminated
||| Return ||| Pickup

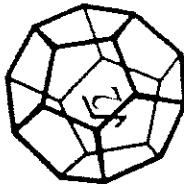
CHAIN OF CUSTODY SEALS Y/N/NA
SHIPPED VIA: UPS Air-Ex Fed-Ex Bus Hand

*MATRIX: DW=Drinking Water; Eff=Effluent; Inf=Influent; SW=Surface Water; GW=Ground Water; S=Soil; O=Other.

ALL CONTAMINATED NON-AQUEOUS SAMPLES WILL BE RETURNED TO CLIENT

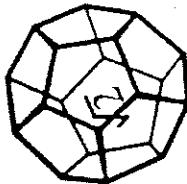
NORTH COAST
LABORATORIES LTD.

7078.2-4649 [An 75-26881] California



Chain of Custody

Eff=Effluent; Inf=Influent; SW=Surface Water; GW=Ground Water; S=Soil; O=Other.



NORTH COAST
LABORATORIES LTD.

6600 West End Road • Arcata • CA 95521-9202
707-822-4449 FAX 707-822-3881

Chain of Custody

* MATRIX: DW=Drinking Water; Eff=Effluent; Inf=Influent; SW=Surface Water; GW=Ground Water; S=Soil; O=Other.

Attachment 2

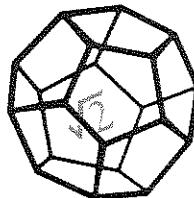
ATTACHMENT 1: KEY TO ABBREVIATIONS

Fortuna Shell; 809 Main St., Fortuna, California

LACO No. 4563.01; LOP No. 12672

KEY TO ABBREVIATIONS	
Alk	-- Alkalinity
BTEX	-- Benzene; Toluene; Ethylbenzene; m,p- and o- Xylenes
CO ₂	-- Carbon dioxide
COC	-- Chain of custody
Cr	-- Chromium
DHP	-- Down-hole-pump (submersible pump)
DIPE	-- Di-isopropyl Ether
Dis	-- Dissolved
DO	-- Dissolved Oxygen
DTW	-- Depth-to-Water
ECw	-- Electrical Conductivity in water
ETBE	-- Ethyl Tertiary Butyl Ether
Fe	-- Iron
FP	-- Free Product
Mn	-- Manganese
MTBE	-- Methyl Tertiary Butyl Ether
N	-- Nitrogen
ND<50	-- non-detect at reporting limits shown
NO ₃	-- Nitrate
NOT	Sample not analyzed for parameter
ACTIVE	-- during current sampling event
ORP	-- Oxidation Reduction Potential
P	-- Phosphorous
PCP/TCP	-- penta- tetra- tri- chlorophenols
pH	-- Potential of hydrogen
SGC	-- Silica gel cleanup
SO ₄	-- Sulfate
T	-- Temperature
T&P	-- Tape and Paste
TAME	-- Tertiary Amyl Methyl Ether
TBA	-- Tertiary Butyl Alcohol
TBF	-- Tertiary Butyl Formate
TIC	-- Total Inorganic Carbon
TOC	-- Total Organic Carbon
Tot	-- Total
TPHd	-- Total Petroleum Hydrocarbons as Diesel
TPHg	-- Total Petroleum Hydrocarbons as Gasoline
TPHk	-- Total Petroleum Hydrocarbons as Kerosene
TPHmo	-- Total Petroleum Hydrocarbons as Motor Oil
TPHs	-- Total Petroleum Hydrocarbons as Solvent
µg/L	-- Micro grams per liter (parts per billion)
---	-- Sample not analyzed for parameter

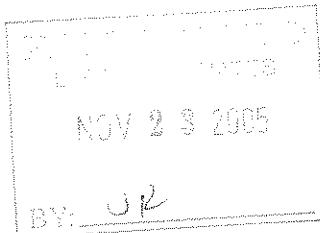
Attachment 3



NORTH COAST
LABORATORIES LTD.

November 22, 2005

LACO Associates
P.O. Box 1023
Eureka, CA 95502



Order No.: 0511064
Invoice No.: 54365
PO No.: TASK 3031
ELAP No. 1247-Expires July 2006

Attn: Accounts Payable

RE: 4563.01, FORTUNA SHELL

SAMPLE IDENTIFICATION

Fraction Client Sample Description

01A 4563-MW1-W
01D 4563-MW1-W
02A 4563-MW2-W
02D 4563-MW2-W
03A 4563-MW3-W
03D 4563-MW3-W
04A 4563-MW4-W
04D 4563-MW4-W
05A 4563-MW5-W
05D 4563-MW5-W
06A 4563-MW6-W
06D 4563-MW6-W
07A 4563-MW7-W
07D 4563-MW7-W
08A 4563-MW8-W
08D 4563-MW8-W
09A 4563-MW9-W
10A 4563-MW10-W
11A 4563-MW11-W
12A 4563-MW12-W
13A 4563-MW13-W
14A 4563-MW14-W
14D 4563-MW14-W
15A 4563-MW15-W
15D 4563-MW15-W
16A 4563-MW16-W
16D 4563-MW16-W
17A 4563-MW17S-W
18A 4563-MW17D-W
20A 4563-QCFD-W
21A 4563-QCTB-W

ND = Not Detected at the Reporting Limit

Limit = Reporting Limit

All solid results are expressed on a wet-weight basis unless otherwise noted.

LMO _____
✓ DRG
DNL _____
GH _____
GEO
HPI _____
FRB
CJW
File _____
Project # _____

REPORT CERTIFIED BY

Laboratory Supervisor(s)

QA Unit

Jesse G. Chaney, Jr.
Laboratory Director

CLIENT: LACO Associates
Project: 4563.01, FORTUNA SHELL
Lab Order: 0511064

CASE NARRATIVE

All samples submitted for a silica gel cleanup were initially analyzed for diesel/motor oil. The samples showing no detectable levels of the analytes were not subjected to the cleanup procedure.

TPH as Diesel/Motor Oil w/ Silica Gel Cleanup:

Samples 4563-MW2-W, 4563-MW4-W, 4563-MW5-W, 4563-MW14-W, 4563-MW15-W and 4563-MW16-W contain some material lighter than diesel. However, some of this material extends into the diesel range of molecular weights.

Samples 4563-MW2-W, 4563-MW3-W, 4563-MW4-W, 4563-MW5-W, 4563-MW8-W, 4563-MW14-W, 4563-MW15-W and 4563-MW16-W contain material in the diesel range of molecular weights, but the material does not exhibit the peak pattern typical of diesel oil.

The relative percent difference (RPD) for the laboratory control samples was above the upper acceptance limit for diesel. This indicates that the results could be variable.

The motor oil results for samples 4563-MW14-W and 4563-MW15-W were reported as ND with a dilution due to insufficient sample volume.

Gasoline Components/Additives:

Sample 4563-MW10-W does not present a peak pattern consistent with that of gasoline. The reported result represents the amount of material in the gasoline range.

The gasoline values for samples 4563-MW1-W and 4563-MW2-W include the reported gasoline components in addition to other peaks in the gasoline range.

The gasoline values for samples 4563-MW4-W, 4563-MW5-W, 4563-MW14-W, 4563-MW15-W, 4563-MW16-W and 4563-QCFD-W include the reported gasoline components and additives in addition to other peaks in the gasoline range.

The gasoline value for sample 4563-MW3-W includes the reported gasoline additives in addition to other peaks in the gasoline range.

The gasoline values for samples 4563-MW7-W, 4563-MW8-W, 4563-MW12-W, 4563-MW13-W and 4563-MW17D-W are primarily from the reported gasoline additives.

Some reporting limits were raised for samples 4563-MW2-W, 4563-MW3-W, 4563-MW4-W, 4563-MW5-W, 4563-MW7-W, 4563-MW8-W, 4563-MW13-W, 4563-MW15-W, 4563-MW16-W, 4563-MW17S-W, 4563-MW17D-W and 4563-QCFD-W due to matrix interference.

CLIENT: LACO Associates
Project: 4563.01, FORTUNA SHELL
Lab Order: 0511064

CASE NARRATIVE

Sample 4563-MW5-W was diluted and the reporting limits raised additionally due to matrix interference.

The surrogate recoveries were below the lower acceptance limit for samples 4563-MW2-W and 4563-MW5-W. The response of the reporting limit standard was such that the analytes would have been detected even with the low recoveries; therefore, the data were accepted.

The laboratory control sample/laboratory control sample duplicate (LCS/LCSD) recoveries were above the upper acceptance limit for benzene. The LCSD recoveries were also above the upper acceptance limits for several other analytes. The reported results for these analytes may be higher than the actual amount present in the samples.

The RPD for the laboratory control samples was above the upper acceptance limit for TBA. This indicates that the results could be variable.

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW1-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-01A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	ND	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	0.65	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	1.8	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	95.5	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	460	50	µg/L	1.0		11/12/05

Client Sample ID: 4563-MW1-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-01D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup

Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	ND	50	µg/L	1.0	11/15/05	11/17/05
TPHC Motor Oil	ND	170	µg/L	1.0	11/15/05	11/17/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW2-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-02A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	ND	7.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	28	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	3.0	µg/L	1.0		11/12/05
Toluene	4.4	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	24	0.50	µg/L	1.0		11/12/05
m,p-Xylene	17	0.50	µg/L	1.0		11/12/05
o-Xylene	0.68	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	78.7	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	6,100	2,500	µg/L	50		11/11/05

Client Sample ID: 4563-MW2-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-02D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	500	50	µg/L	1.0	11/15/05	11/17/05
TPHC Motor Oil	ND	170	µg/L	1.0	11/15/05	11/17/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW3-W Received: 11/3/05 Collected: 11/1/05 0:00
Lab ID: 0511064-03A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	76	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	22	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	4.7	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	93.0	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	280	50	µg/L	1.0		11/12/05

Client Sample ID: 4563-MW3-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-03D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup

Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	69	50	µg/L	1.0	11/15/05	11/16/05
TPHC Motor Oil	ND	170	µg/L	1.0	11/15/05	11/16/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW4-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-04A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	ND	8.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	41	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	9.5	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	1.2	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	9.1	0.50	µg/L	1.0		11/12/05
m,p-Xylene	4.3	0.50	µg/L	1.0		11/12/05
o-Xylene	0.68	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	90.2	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	2,300	50	µg/L	1.0		11/12/05

Client Sample ID: 4563-MW4-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-04D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	240	50	µg/L	1.0	11/15/05	11/17/05
TPHC Motor Oil	ND	170	µg/L	1.0	11/15/05	11/17/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW5-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-05A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	ND	400	µg/L	50		11/11/05
Tert-butyl alcohol (TBA)	61	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	630	25	µg/L	50		11/11/05
Tert-amyl methyl ether (TAME)	6.2	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	3.0	µg/L	1.0		11/12/05
Toluene	15	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	97	0.50	µg/L	1.0		11/12/05
m,p-Xylene	78	0.50	µg/L	1.0		11/12/05
o-Xylene	2.0	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	75.6	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	13,000	2,500	µg/L	50		11/11/05

Client Sample ID: 4563-MW5-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-05D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup

Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	12,000	1,200	µg/L	25	11/15/05	11/17/05
TPHC Motor Oil	7,100	4,200	µg/L	25	11/15/05	11/17/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW6-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-06A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	11	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
c-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	94.9	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	ND	50	µg/L	1.0		11/12/05

Client Sample ID: 4563-MW6-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-06D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup

Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	ND	50	µg/L	1.0	11/15/05	11/16/05
TPHC Motor Oil	ND	170	µg/L	1.0	11/15/05	11/16/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW7-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-07A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	280	50	µg/L	50		11/11/05
Tert-butyl alcohol (TBA)	ND	65	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	1.3	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	12	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	3.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	99.1	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	230	50	µg/L	1.0		11/12/05

Client Sample ID: 4563-MW7-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-07D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	ND	50	µg/L	1.0	11/15/05	11/16/05
TPHC Motor Oil	ND	170	µg/L	1.0	11/15/05	11/16/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW8-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-08A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	3,000	50	µg/L	50		11/11/05
Tert-butyl alcohol (TBA)	420	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	2.1	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	9.8	1.0	µg/L	1.0		11/12/05
Benzene	1.3	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	80	50	µg/L	50		11/11/05
1,2-Dichloroethane	ND	3.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	98.3	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	1,200	50	µg/L	1.0		11/12/05

Client Sample ID: 4563-MW8-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-08D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup

Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	110	50	µg/L	1.0	11/15/05	11/16/05
TPHC Motor Oil	ND	170	µg/L	1.0	11/15/05	11/16/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW9-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-09A

Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	5.8	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	91.5	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	ND	50	µg/L	1.0		11/12/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW10-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-10A

Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	4.1	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DiPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	107	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	99	50	µg/L	1.0		11/12/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW11-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-11A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
Methyl tert-butyl ether (MTBE)	2.2	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	94.7	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
TPHC Gasoline	ND	50	µg/L	1.0		11/12/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW12-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-12A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
Methyl tert-butyl ether (MTBE)	580	50	µg/L	50		11/11/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	1.1	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	1.8	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	21	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	92.4	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
TPHC Gasoline	340	50	µg/L	1.0		11/12/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW13-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-13A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
Methyl tert-butyl ether (MTBE)	390	50	µg/L	50		11/11/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	2.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	14	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	94.8	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
TPHC Gasoline	250	50	µg/L	1.0		11/12/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW14-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-14A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	6.6	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	0.88	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	1.3	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	91.9	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	920	50	µg/L	1.0		11/12/05

Client Sample ID: 4563-MW14-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-14D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	92	57	µg/L	1.1	11/15/05	11/17/05
TPHC Motor Oil	ND	190	µg/L	1.1	11/15/05	11/17/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW15-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-15A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	ND	120	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	28	µg/L	1.0		11/12/05
Di-isopropyl ether (DPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	180	25	µg/L	50		11/11/05
Tert-amyl methyl ether (TAME)	2.6	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/12/05
Toluene	4.4	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	35	0.50	µg/L	1.0		11/12/05
m,p-Xylene	11	0.50	µg/L	1.0		11/12/05
o-Xylene	0.56	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	91.0	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	2,500	50	µg/L	1.0		11/12/05

Client Sample ID: 4563-MW15-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-15D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	99	62	µg/L	1.2	11/15/05	11/17/05
TPHC Motor Oil	ND	210	µg/L	1.2	11/15/05	11/17/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW16-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-16A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	430	50	µg/L	50		11/11/05
Tert-butyl alcohol (TBA)	280	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	4.5	1.0	µg/L	1.0		11/12/05
Benzene	1,000	25	µg/L	50		11/11/05
Tert-amyl methyl ether (TAME)	11	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	3.0	µg/L	1.0		11/12/05
Toluene	16	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	27	0.50	µg/L	1.0		11/12/05
m,p-Xylene	30	0.50	µg/L	1.0		11/12/05
o-Xylene	5.9	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	87.1	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	6,100	2,500	µg/L	50		11/11/05

Client Sample ID: 4563-MW16-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-16D Matrix: Groundwater

Test Name: TPH as Diesel/Motor Oil w/ Silica Gel Cleanup Reference: EPA 3510/3630/GCFID(LUFT)/8015B

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Diesel (C12-C22)	860	50	µg/L	1.0	11/15/05	11/17/05
TPHC Motor Oil	1,800	170	µg/L	1.0	11/15/05	11/17/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW17S-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-17A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
Methyl tert-butyl ether (MTBE)	4.1	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	3.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	93.4	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
TPHC Gasoline	ND	50	µg/L	1.0		11/12/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-MW17D-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-18A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
Methyl tert-butyl ether (MTBE)	64	1.0	µg/L	1.0		11/12/05
Tert-butyl alcohol (TBA)	ND	35	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/12/05
Benzene	ND	0.50	µg/L	1.0		11/12/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	3.0	µg/L	1.0		11/12/05
Toluene	ND	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/12/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/12/05
o-Xylene	ND	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	96.2	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
TPHC Gasoline	92	50	µg/L	1.0		11/12/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-QCFD-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-20A Matrix: Groundwater

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
Methyl tert-butyl ether (MTBE)	430	50	µg/L	50		11/12/05
Tert-butyl alcohol (TBA)	260	10	µg/L	1.0		11/12/05
Di-isopropyl ether (DIPE)	ND	1.0	µg/L	1.0		11/12/05
Ethyl tert-butyl ether (ETBE)	4.2	1.0	µg/L	1.0		11/12/05
Benzene	940	25	µg/L	50		11/12/05
Tert-amyl methyl ether (TAME)	10	1.0	µg/L	1.0		11/12/05
1,2-Dichloroethane	ND	3.0	µg/L	1.0		11/12/05
Toluene	17	0.50	µg/L	1.0		11/12/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/12/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Ethylbenzene	40	0.50	µg/L	1.0		11/12/05
m,p-Xylene	37	0.50	µg/L	1.0		11/12/05
o-Xylene	6.7	0.50	µg/L	1.0		11/12/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/12/05
Surrogate: 1,4-Dichlorobenzene-d4	84.1	80.8-139	% Rec	1.0		11/12/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

<u>Parameter</u>	<u>Result</u>	<u>Limit</u>	<u>Units</u>	<u>DF</u>	<u>Extracted</u>	<u>Analyzed</u>
TPHC Gasoline	7,400	2,500	µg/L	50		11/12/05

Date: 22-Nov-05
WorkOrder: 0511064

ANALYTICAL REPORT

Client Sample ID: 4563-QCTB-W

Received: 11/3/05

Collected: 11/1/05 0:00

Lab ID: 0511064-21A Matrix: Trip Blank

Test Name: Gasoline Components/Additives

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
Methyl tert-butyl ether (MTBE)	ND	1.0	µg/L	1.0		11/11/05
Tert-butyl alcohol (TBA)	ND	10	µg/L	1.0		11/11/05
Di-isopropyl ether (DIPPE)	ND	1.0	µg/L	1.0		11/11/05
Ethyl tert-butyl ether (ETBE)	ND	1.0	µg/L	1.0		11/11/05
Benzene	ND	0.50	µg/L	1.0		11/11/05
Tert-amyl methyl ether (TAME)	ND	1.0	µg/L	1.0		11/11/05
1,2-Dichloroethane	ND	1.0	µg/L	1.0		11/11/05
Toluene	ND	0.50	µg/L	1.0		11/11/05
1,2-Dibromoethane (EDB)	ND	1.0	µg/L	1.0		11/11/05
Chlorobenzene	ND	1.0	µg/L	1.0		11/11/05
Ethylbenzene	ND	0.50	µg/L	1.0		11/11/05
m,p-Xylene	ND	0.50	µg/L	1.0		11/11/05
o-Xylene	ND	0.50	µg/L	1.0		11/11/05
1,3-Dichlorobenzene	ND	1.0	µg/L	1.0		11/11/05
1,4-Dichlorobenzene	ND	1.0	µg/L	1.0		11/11/05
1,2-Dichlorobenzene	ND	1.0	µg/L	1.0		11/11/05
Surrogate: 1,4-Dichlorobenzene-d4	93.0	80.8-139	% Rec	1.0		11/11/05

Test Name: TPH as Gasoline

Reference: LUFT/EPA 8260B Modified

Parameter	Result	Limit	Units	DF	Extracted	Analyzed
TPHC Gasoline	ND	50	µg/L	1.0		11/11/05

North Coast Laboratories, Ltd.

Date: 17-Nov-05

CLIENT: LACO Associates
Work Order: 0511064
Project: 4563.01, FORTUNA SHELL

QC SUMMARY REPORT

Method Blank

Sample ID	MB 111105	Batch ID:	R38028	Test Code:	82600XYW	Units:	µg/L	Analysis Date	11/11/05 7:01:00 AM	Prep Date		
Client ID:				Run ID:	ORGCMS2_051111A	Seq No:	547425					
Analyte		Result	Limit	SPK value	SPK Ref Val	% Rec	Low Limit	High Limit	RPD Ref Val	% RPD	RPDLimit	Qual
Methyl tert-butyl ether (MTBE)	ND	1.0										
Terf-butyl alcohol (TBA)	ND	10										
Di-isopropyl ether (DIPE)	ND	1.0										
Ethyl tert-butyl ether (ETBE)	ND	1.0										
Benzene	ND	0.50										
Tert-amyl methyl ether (TAME)	ND	1.0										
1,2-Dichloroethane	ND	1.0										
Toluene	ND	0.50										
1,2-Dibromoethane (EDB)	ND	1.0										
Chlorobenzene	ND	1.0										
Ethybenzene	0.06335	0.50										
m,p-Xylene	ND	0.50										
o-Xylene	ND	0.50										
1,3-Dichlorobenzene	ND	1.0										
1,4-Dichlorobenzene	ND	1.0										
1,2-Dichlorobenzene	ND	1.0										
1,4-Dichlorobenzene-d4	0.957	0.10	1.00	0	95.7%	81	139	0				
Sample ID	MB 111105	Batch ID:	R38038	Test Code:	GASW-MS	Units:	µg/L	Analysis Date	11/11/05 7:01:00 AM	Prep Date		
Client ID:				Run ID:	ORGCMS2_051111B	Seq No:	547526					
Analyte		Result	Limit	SPK value	SPK Ref Val	% Rec	Low Limit	High Limit	RPD Ref Val	% RPD	RPDLimit	Qual
TPHC Gasoline	ND	50										

Qualifiers: ND - Not Detected at the Reporting Limit
J - Analyte detected below quantitation limits

S - Spike Recovery outside accepted recovery limits
R - RPD outside accepted recovery limits

B - Analyte detected in the associated Method Blank

CLIENT: LACO Associates
Work Order: 0511064
Project: 4563.01, FORTUNA SHELL

QC SUMMARY REPORT

Method Blank

Sample ID	MB-14656	Batch ID:	14656	Test Code:	SGTPDMW	Units:	µg/L	Analysis Date	11/16/05 8:55:09 PM	Prep Date	11/15/05	
Client ID:		Run ID:		ORGC5_051116A				SeqNo:	548333			
Analyte		Result	Limit	SFK value	SPK Ref Val	% Rec	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
TPHC Diesel (C12-C22)		35.75	50									
TPHC Motor Oil		77.29	170									

Qualifiers:

ND - Not Detected at the Reporting Limit
J - Analyte detected below quantitation limits

S - Spike Recovery outside accepted recovery limits

B - Analyte detected in the associated Method Blank

R - RPD outside accepted recovery limits

North Coast Laboratories, Ltd.

Date: 17-Nov-05

CLIENT: LACO Associates
Work Order: 0511064
Project: 4563.01, FORTUNA SHELL

QC SUMMARY REPORT
 Laboratory Control Spike

Sample ID	LCS-05722	Batch ID:	R38028	Test Code:	826NOXYW	Units:	µg/L	Analysis Date 11/11/05 4:01:00 AM			Prep Date			
Client ID:		Run ID:		SeqNo:	547423			% Rec	LowLimit	HighLimit	RPD Ref Val	% RPD	RPDLimit	Qual
Analyte		Result	Limit	SFK value	SPK value	SPK Ref Val								
Methyl tert-butyl ether (MTBE)	20.64	1.0	20.0	0	0	103%	80	120	0	0	0	0	0	
Tert-butyl alcohol (TBA)	435.8	10	400	0	0	109%	25	162	0	0	0	0	0	
Di-isopropyl ether (DIPE)	21.38	1.0	20.0	0	0	107%	80	120	0	0	0	0	0	
Ethyl tert-butyl ether (ETBE)	19.05	1.0	20.0	0	0	95.2%	77	120	0	0	0	0	0	
Benzene	24.08	0.50	20.0	0	0	120%	78	117	0	0	0	0	0	S
Ter-tamyl methyl ether (TAME)	19.04	1.0	20.0	0	0	95.2%	64	136	0	0	0	0	0	
1,2-Dichloroethane	23.15	1.0	20.0	0	0	116%	74	121	0	0	0	0	0	
Toluene	22.40	0.50	20.0	0	0	112%	80	120	0	0	0	0	0	
1,2-Dibromoethane (EDB)	21.57	1.0	20.0	0	0	108%	80	120	0	0	0	0	0	
Chlorobenzene	23.57	1.0	20.0	0	0	118%	80	120	0	0	0	0	0	
Ethybenzene	22.85	0.50	20.0	0	0	114%	80	120	0	0	0	0	0	
m,p-Xylene	47.49	0.50	40.0	0	0	119%	80	120	0	0	0	0	0	
o-Xylene	22.34	0.50	20.0	0	0	112%	80	120	0	0	0	0	0	
1,3-Dichlorobenzene	24.78	1.0	20.0	0	0	124%	81	125	0	0	0	0	0	
1,4-Dichlorobenzene	24.23	1.0	20.0	0	0	121%	79	132	0	0	0	0	0	
1,2-Dichlorobenzene	23.84	1.0	20.0	0	0	119%	81	134	0	0	0	0	0	
1,4-Dichlorobenzene-d4	1.21	0.10	1.00	0	0	121%	81	139	0	0	0	0	0	

Qualifiers:

ND - Not Detected at the Reporting Limit

J - Analyte detected below quantitation limits

S - Spike Recovery outside accepted recovery limits

B - Analyte detected in the associated Method Blank

R - RPD outside accepted recovery limits

CLIENT: LACO Associates
Work Order: 0511064
Project: 4563.01, FORTUNA SHELL

QC SUMMARY REPORT
 Laboratory Control Spike Duplicate

Sample ID	LCSD-05722	Batch ID:	R38028	Test Code:	8266OXYW	Units:	µg/L	Analysis Date 11/12/05 3:29:00 AM			Prep Date	
Client ID:		Run ID:	ORGCMSS2_051111A	SeqNo:	547442							
Analyte		Result	Limit	SPK value	SPK Ref Val	% Rec	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Methyl tert-butyl ether (MTBE)		20.77	1.0	20.0	0	104%	80	120	20.6	0.588%	20	
Tert-butyl alcohol (TBA)		289.8	10	400	0	72.5%	25	162	436	40.2%	20	R
Di-isopropyl ether (DIPE)		21.82	1.0	20.0	0	109%	80	120	21.4	2.02%	20	
Ethyl tert-butyl ether (ETBE)		18.77	1.0	20.0	0	93.8%	77	120	19.0	1.48%	20	
Benzene		26.59	0.50	20.0	0	133%	78	117	24.1	9.90%	20	S
Tert-amyl methyl ether (TAME)		18.27	1.0	20.0	0	91.3%	64	136	19.0	4.15%	20	
1,2-Dichloroethane		25.74	1.0	20.0	0	129%	74	121	23.2	10.6%	20	S
Toluene		24.57	0.50	20.0	0	123%	80	120	22.4	9.22%	20	S
1,2-Dibromoethane (EDB)		23.29	1.0	20.0	0	116%	80	120	21.6	7.67%	20	
Chlorobenzene		25.38	1.0	20.0	0	127%	80	120	23.6	7.43%	20	S
Ethylbenzene		25.18	0.50	20.0	0	126%	80	120	22.8	9.70%	20	S
m,p-Xylene		54.08	0.50	40.0	0	135%	80	120	47.5	13.0%	20	S
o-Xylene		24.66	0.50	20.0	0	123%	80	120	22.3	9.86%	20	S
1,3-Dichlorobenzene		27.72	1.0	20.0	0	139%	81	125	24.8	11.2%	20	S
1,4-Dichlorobenzene		27.04	1.0	20.0	0	135%	79	132	24.2	11.0%	20	S
1,2-Dichlorobenzene		27.02	1.0	20.0	0	135%	81	134	23.8	12.5%	20	S
1,4-Dichlorobenzene-d4		1.33	0.10	1.00	0	133%	81	139	1.21	10.1%	20	
TPHC Gasoline		1,077	50	1,000	0	108%	80	120	1,060	1.46%	20	
TPHC Gasoline		1,061	50	1,000	0	106%	80	120	0	0	0	
Sample ID	LCSD-05723	Batch ID:	R38038	Test Code:	GASW-MS	Units:	µg/L	Analysis Date 11/11/05 5:32:00 AM			Prep Date	
Client ID:		Run ID:	ORGCMSS2_051111B	SeqNo:	547524							
Analyte		Result	Limit	SPK value	SPK Ref Val	% Rec	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
TPHC Gasoline												
Sample ID	LCSD-05723	Batch ID:	R38038	Test Code:	GASW-MS	Units:	µg/L	Analysis Date 11/12/05 3:58:00 AM			Prep Date	
Client ID:		Run ID:	ORGCMSS2_051111B	SeqNo:	547538							
Analyte		Result	Limit	SPK value	SPK Ref Val	% Rec	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
TPHC Gasoline												

Qualifiers: ND - Not Detected at the Reporting Limit
 J - Analyte detected below quantitation limits

S - Spike Recovery outside accepted recovery limits
 R - RPD outside accepted recovery limits
 B - Analyte detected in the associated Method Blank

CLIENT: LACO Associates
Work Order: 0511064
Project: 4563.01, FORTUNA SHELL

QC SUMMARY REPORT
Laboratory Control Spike

Sample ID	LCS-14656	Batch ID:	14656	Test Code:	SGTPDMW	Units:	µg/L	Analysis Date 11/16/05 6:19:48 PM			Prep Date 11/15/05	
Client ID:		Run ID:		ORGC5_051116A				SeqNo:	548331			
Analyte		Result	Limit	SPK value	SPK Ref Val	% Rec	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
TPHC Diesel (C12-C22)		344.6	50	500	0	68.9%	46	91	0			
TPHC Motor Oil		980.0	170	1,000	0	98.0%	48	113	0			
Sample ID	LCSD-14656	Batch ID:	14656	Test Code:	SGTPDMW	Units:	µg/L	Analysis Date 11/16/05 6:50:48 PM			Prep Date 11/15/05	
Client ID:		Run ID:		ORGC5_051116A				SeqNo:	548332			
Analyte		Result	Limit	SPK value	SPK Ref Val	% Rec	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
TPHC Diesel (C12-C22)		413.4	50	500	0	82.7%	46	91	345	18.2%	15	R
TPHC Motor Oil		1,079	170	1,000	0	108%	48	113	980	9.60%	15	

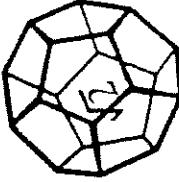
Qualifiers:

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R - RPD outside accepted recovery limits

B - Analyte detected in the associated Method Blank



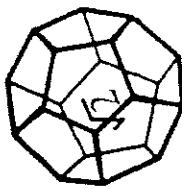
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***MATRIX:** DW=Drinking Water; Eff=Effluent; Inf=Influent; SW=Surface Water; GW=Ground Water; S=Soil; O=Other.



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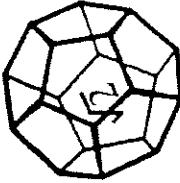
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DW=Drinking Water; Eff=Effluent; Inf=Influent; SW=Surface Water; GW=Ground Water; S=Soil; O=Other.

ALL CONTAMINATED NON-AQUIFOUS SAMPLES WILL BE RETURNED TO CLIENT



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Chain of Custody

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ALL CONTAMINATED NON-AQUEOUS SAMPLES WILL BE RETURNED TO CLIENT.